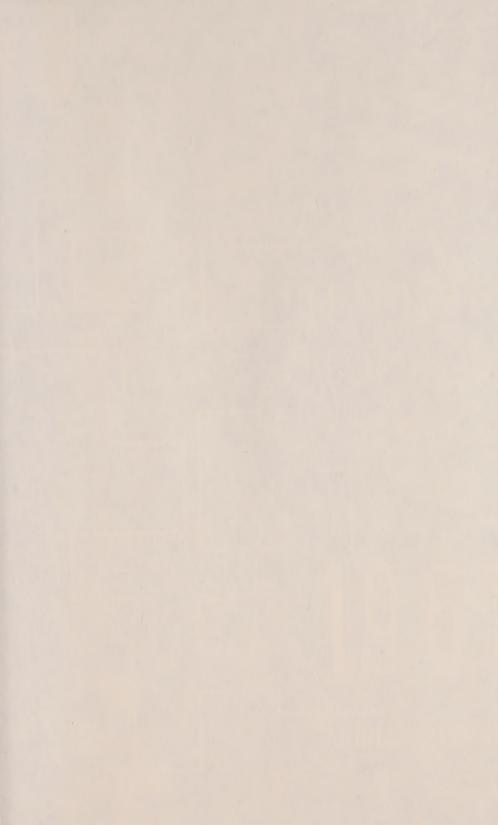


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# REPORT

of the

# Minister of Public Works

PROVINCE OF ONTARIO

FOR THE YEAR ENDING MARCH 31, 1961

PRINTED BY ORDER OF THE

LEGISLATIVE ASSEMBLY OF ONTARIO

SESSIONAL No. 14 — 1961

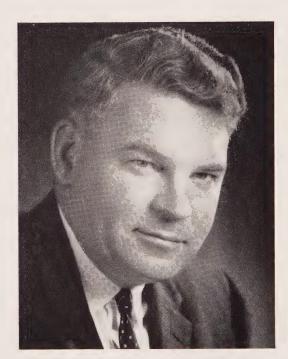


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TORONTO

CANADA





THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE J. KEILLER MACKAY, Lieutenant-Governor of the Province of Ontario.

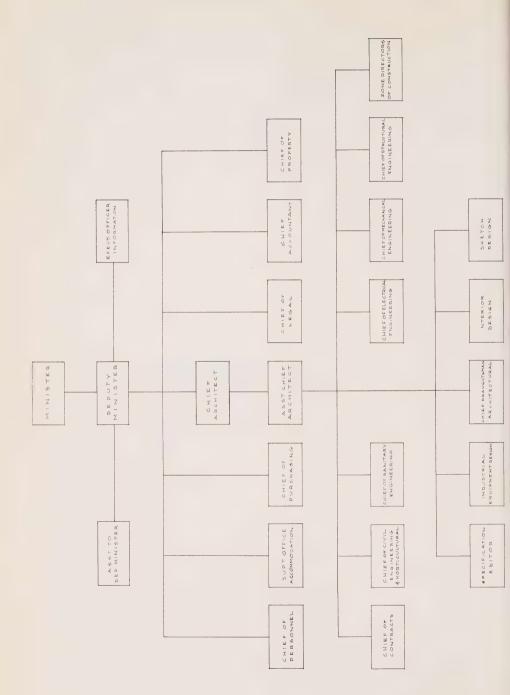
### MAY IT PLEASE YOUR HONOUR:

As required by law, I submit for the information of your Honour and the Legislative Assembly, the Annual Report of the works under control of the Public Works Department, comprising the report of the Deputy Minister, for the twelve months ending the 31st of March, 1961.

Respectfully submitted,

MINISTER OF PUBLIC WORKS

Department of Public Works, Ontario Toronto, March 31, 1961.



THE HONOURABLE RAY CONNELL, Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Sir:

I have the honour to submit to you my General Summary together with the reports of the Chiefs of the Architects' Branch, the Property Branch, the Accounts Branch, the Civil Engineering Division and the Sanitary Engineering Division, for the fiscal year, April 1, 1960, to March 31, 1961.

In presenting this Report may I take the opportunity on behalf of the staff to express our appreciation to you for the kindly consideration you have given to all matters pertaining to the administration of the Department. May I also thank the members of the staff for their assistance and untiring efforts in carrying out a large construction program.

I have the honour to be, Sir,

Your obedient servant,

J. D. Willer
Deputy Minister of Public Works.

Toronto, March 31, 1961.

#### SUMMARY BY THE DEPUTY MINISTER OF PUBLIC WORKS

This report shows a drop in spending of the Department of Public Works on both capital and ordinary accounts, totalling some \$21,792,310. A large part of this is caused by the transfer of responsibility for the Ontario Water Resources Commission to the Department of Municipal Affairs, at the end of the preceding fiscal year.

A substantial sum was saved through the change in emphasis from day labour work to contract work. It is not possible to definitively establish the savings effected by tendering all our major works, but there is reason to believe that the purchasing power of our construction dollar has been increased by as much as 30 per cent.

It is not a new policy to require that tenders be called wherever economically feasible. It is clearly set out in The Public Works Act, Section 5 Subsection (3) that "That Minister shall, by public advertisement, invite tenders for the construction or repair of all public works, except in cases of pressing emergency, where delay would be injurious to the public interest, or where from the nature of the work, it can be more expeditiously or economically executed by officers and servants of the Department, or by day labour."

There have been periods in the history of the Department when a majority of the work was done by day labour and there have been periods when a majority of the work was done by contract. For example, the East Block of the Parliament Buildings was constructed mainly by day labour. The first sections were built that way because of lack of available contracting companies to undertake the job; the last section was built by day labour as a Depression employment project.

In the years following the Second World War, the construction boom in Ontario was such that the construction forces of the Department, augmented by day labour, could effectively compete with the contracting firms within the meaning of Subsection (3) quoted above. As the construction boom eased off, it became clear that sharpened competition between the contracting firms would give us better value for our construction dollar. We have therefore reduced our casual staff and are calling all major jobs by public tender.

Through continuing and wider use of the bid depository system, we have in the majority of cases been able to award each project to one prime contractor, thus eliminating many complexities, with attendant administration and accounting problems which existed when the Department

had a variety of firms under contract with us to execute their respective trades on the same job.

This has meant that whereas we employed an average of more than 2,000 casual workers daily during the fiscal year 1959-60, during the past fiscal year this average was reduced to 1,143. In March 1961, an average of 953 casual workers were employed by this department.

In conjunction with the reduction in day labour work, there is a reduction in management costs, supervision, travelling expenses, equipment rentals and other ancillary costs. All of the above has been achieved without reducing the efficiency of the Department and, it is felt, has resulted in an increase in efficiency.

It has enabled us to free more of our staff for planning and basic research. We also are able to more effectively plan and accurately preestimate individual projects, and to do long range studies for larger programs such as the redevelopment of the Queen's Park area and the re-establishment of that area as an effective centre of provincial government operations.

## REPORT OF THE CHIEF OF THE ARCHITECTS' BRANCH

MR. J. D. MILLAR, Deputy Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Dear Sir:

I have the honour to report on the work carried out by the Architects' Branch of the Department of Public Works, Ontario, during the fiscal year April 1, 1960 to March 31, 1961.

A continued program to streamline and increase the efficiency of the operation of this branch was carried on during the fiscal year. A great deal of advance planning was done and with a new system of pre-estimating jobs, the branch is better equipped to carry out its functions in the construction of public buildings.

The major planning carried forward was the long-term program of re-location of the head offices of the various departments in Metropolitan Toronto in the Queen's Park area. With the acquisition of a large parcel of land immediately east of the existing East Block, it was possible to do basic sketch work and planning for construction of some 1,200,000 square feet of office space to be erected on the newly-acquired land.

Some \$100,000,000 worth of construction was in some stage of planning or construction at the end of the fiscal year.

The greatest single project nearing completion was the 1250-bed Ontario Hospital School for Retarded Children at Cedar Springs, south of Chatham. The year also marked the completion of the 600-bed hospital group for the Ontario Hospital, Hamilton. Other major projects appear in the report below, listed by departments.



Aerial view of the new Ontario Hospital School for Retarded Children, Cedar Springs.

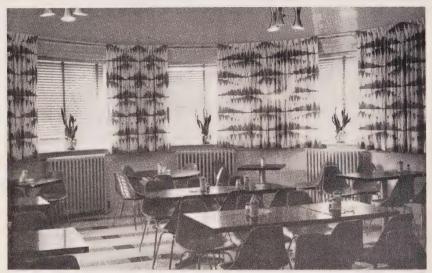


Aerial view of the new 600-bed hospital group, Ontario Hospital, Hamilton.

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

A considerable program of alteration, renovation and redecoration was carried forward during the year for the accommodation of various departments in the Parliament Buildings.

In the Main Building, the old ventilation system in the Legislative Chamber was replaced with a modern, water washed and filtered system equipped with automatic controls to maintain an even and comfortable temperature. A new staff cafeteria was provided on the fourth floor and the



A section of the new staff cafeteria, Main Building, Parliament Buildings, Toronto.

former staff cafeteria on the second floor renovated and redecorated as a private dining room for members of the Legislative Assembly. In the East Press Gallery, a mezzanine floor was constructed and a washroom provided. Areas were partitioned for private offices for members of the Press and lounge rooms also provided.

Routine maintenance, renovation and redecoration work was carried out in other office space occupied by the government throughout Metropolitan Toronto.

At 801 Bay St. a 12-storey office building was made ready for occupancy by the Gas Tax Branch of the Department of Highways, the Ontario Water Resources Commission and the Department of Municipal Affairs.

At Osgoode Hall, interior work was extensive and progressive, including redecoration of the main corridors, remodelling, redecoration and

electrical work. Work of this nature was completed at the Judges' main library, the Chambers of Justices Spence, Kelly, Donnelly and Thompson and in offices of the Chief Justice of Ontario and the Senior Master's office. Window repairs were completed; the Normandy stonework of the central rotunda cleaned; and slated and tar and gravel roofs reroofed.

Alterations were made on the third floor of the Brigden building on Richmond St. to provide a photographic laboratory for the Department of Lands and Forests. Two buildings at adjacent 166 and 168 Richmond St. were demolished.

### **ONTARIO GOVERNMENT BRANCH OFFICE BUILDINGS**

At Sault Ste. Marie, contract was let for construction of a three-storey office building which will house five Government Departments and a store of the Ontario Liquor Control Board. Construction began August 20, 1960.

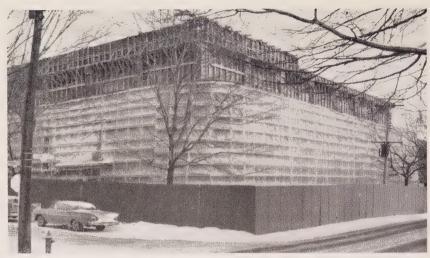
This "L"-shaped building is on the north side of Albert St., on a site bounded by McDougall and Brock Sts. Overall dimensions are 114 by 83



Advanced construction of the new Ontario Government Building, Sault Ste. Marie.

feet, giving a total floor area of about 29,120 square feet. Construction is of reinforced concrete with brick and tile masonry.

The Liquor Control Board offices and stores will be on the ground floor with warehouse space in the basement. The second floor will be occupied largely by Highways but with Agriculture operating from a three-office suite. The third floor will provide space for Health, Labour and Education, as well as a general conference room.



Winter construction using the polyethylene film envelope, Ontario Government Building, Sault Ste. Marie.

Exterior masonry is nearing completion, interior brick work is in progress and work on all trades is progressing rapidly.

Renovation and maintenance was carried out at other Government Buildings including Elk Lake, Kemptville, Kingston, Matheson, Red Lake and Sioux Lookout.

## DEPARTMENT OF PUBLIC WORKS REGIONAL BUILDINGS

The new regional office and stores building at McFarlane Lake (Sudbury) was completed. Construction of the 160 by 52-foot building



Regional Office and Storage Building, Department Public Works, McFarlane Lake.

was started in August 1958. Of brick, steel and reinforced concrete, it is a two-storey office building with single-storey heated storage and a five-bay garage. Extensive work on sewage and water services was also completed. At Huntsville, yard and highway entrances were paved.

# For The DEPARTMENT OF AGRICULTURE

At the Ontario Agricultural College, Guelph, finishing work was completed on the new Biology Building, the second in the Science Buildings group, and the building is in full instructional use. During the year, contract was let and work essentially completed on a new Refrigerated Storage Building which will replace three obsolete structures on the campus. Approximately 220 feet long and 50 feet wide, with 13,000 square feet of floor



The new Refrigerated Storage Building, O.A.C., Guelph.

space, it contains extensive equipment designed to maintain specific atmospheric conditions. There are three special cold storage rooms, 16 feet high, on the main floor. One of these has special automatic temperature and humidity control; a second provides jacketed storage, the third is a standard cold storage room. In the basement is a refrigerated storage room and two rooms with circulated air storage, three growth chambers, a laboratory and service rooms. Ramps and a reversible conveyor connect floors. A new piggery and boar pen is also well under way. A "T"-shaped structure, the base of the "T" is 87 feet by 36 feet with 16 pens with exercise yards running the length of each side. The cross section includes dry sow. feed and farrowing areas, office, electrical and boiler rooms, as well as additional exercise yards. There is storage on the second floor. An addition to the powerhouse to serve water softening equipment was begun in July. Extensive renovations and improvements to other buildings and grounds included fire protection work; underground electrical services; roads, drains and sanitary sewers; re-roofing of Trent Institute; curbs and sidewalks at

the Physical Education Building; washrooms in the Administration Building, and alterations to MacDonald Institute to provide additional student space.

Minor work was undertaken at the Ontario Veterinary College including conversion of the Horse Clinic to offices and laboratories; construction of a septic tank for "D" building at the Gale farm; a new leeching pit at the Research station, and re-roofing of the main building.

At New Liskeard, a new Regional Services Building was started in August and is substantially completed. Single-storey, of concrete and brick construction, the "L"-shaped building faces No. 11 Highway, south of the main buildings on the Demonstration Farm. The main core is about 158 feet by 37 feet and the wing is 54 feet by 51. Parking for 30 cars is provided. Erection of main barn, sheep barn, trussed pole barn, silo and feed hopper, henhouse and single and double garages was completed during the year, as was some paving.

At Brighton, a Regional Services Building to serve the Quinte area was started in July and is largely completed. This is single-storey with finished cement block basement. On the main floor is office space for the agricultural representative and his assistant, inspectors, home economics personnel, the



The substantially completed Agricultural Services Building, Brighton.

fruit and vegetable representative and the agricultural engineer. There is also a meeting room to seat 150, a servery and other facilities. In the basement is a receiving area for animals being brought in for inspection, treatment, operations, postmortems, etc. A corridor runs the 140-foot length of the building and, opening off this, is a large recessed area with operating rooms where farmers may watch operations. Offices for the veterinarians and laboratories for chemical, bacteriology and dairy husbandry research are also in the basement.

At Kemptville Agricultural School, a bronze plaque to mark the opening of the new Regional Veterinary Laboratory was unveiled by J. D. Millar, Deputy Minister of Public Works, and Dr. C. D. Graham, Deputy Minister of Agriculture, on June 10, 1960. The laboratory is two storeys and basement, about 86 feet by 52 feet and is built of brick, structural tile and concrete. At the same school, the new Home Economics Building was completed and occupied in December. Two storeys with basement, this



The new Girls' Residence and Home Economics Building, Kemptville Agricultural School.

structure is of brick construction and is about 152 feet by 40 feet. Accommodation includes residence for 40 girls and a classroom on each floor.

At Western Ontario Agricultural School, Ridgetown, two new buildings were completed and a third is well under way. The Animal Husbandry Building is about 124 feet by 76 feet, of fire-resistant construction with roof of open web steel joist. It includes a raised judging area with galleries on either side and lanterns of glass block over the centre area. In addition to eight pens, there is cold storage, cooler, quick freeze, locker room and washrooms. The Agronomy Building was started in June and was substantially completed by the end of the fiscal year. A split level, storey-and-one-half building with partial basement, it is about 199 feet long and 25 feet wide. A concrete ramp from the main level gives access to the basement. The building includes lecture rooms, laboratory, machine storage, seed storage, seed vaults, seed drying and seed processing rooms, growth channels, soils laboratory, cold storage rooms and offices. A new Beef Barn was

started in October and finished during the year. It is 165 feet by 38 feet and provides storage for straw and feed as well as areas for calves, cows and two bullpens. It is open to the south and has long overhanging eaves to protect cattle against the weather. General maintenance was also carried out at the other school buildings including paving, painting and sewage disposal work.

At Bradford, construction of a Fruit Inspection station is near completion. Minor maintenance was carried out at Gravenhurst Agricultural Inspection station and in the Hearst office building.

# For The DEPARTMENT OF THE ATTORNEY GENERAL

### ONTARIO PROVINCIAL POLICE BUILDINGS

Three new district headquarters buildings are under construction for the Ontario Provincial Police at Belleville, Burlington and Cornwall. These are similar in design to those which have been completed at Barrie, Niagara Falls and Port Arthur.

At Burlington, construction was started in September 1960 on a site south of the Brant Memorial Hospital, off No. 2 Highway, north of the Burlington Skyway. The administration section is two storeys with full



Construction progress of the new District Headquarters' Building, Burlington.

basement, 117 feet by 37 feet; the single-storey four-cell block is 24 feet by 45 feet. A seven-bay patrol garage is also provided.

At Belleville, a similar headquarters building was started in March at the intersection of Highways 14 and 401. This will serve the counties of Addington, Frontenac, Hastings and Prince Edward-Lennox.

At Cornwall, the site chosen is about seven miles west of the city in the town of Long Sault in Cornwall Township. It is north of No. 2 Highway and is bounded by Bethune Ave., Milles Roches Rd., and Simcoe St. Construction was started in February on the building which will serve the Glengarry, Grenville-Dundas and Stormont areas.

Two new detachment buildings were also under construction during the year, at Dryden and Espanola.

At Dryden, work was started in July and was substantially complete at the end of the fiscal year, and the police moved in late in March. This detachment is the fourth new police centre serving the Kenora district. It is of brick and concrete construction, single-storey with partial basement, measuring 168 feet by 55 feet. The basement is under living quarters only and consists of a laundry room, heating area and general storage. The main floor comprises a detention area of five male and three female cells; interrogation room, corporal's office, staff and witness rooms, washroom facilities, main office, radio room, vault and storage rooms. Living quarters consist of a living room, kitchen, three bedrooms and bathroom. A small garage is at the west end of the building and a parking lot will hold 15 cars.

At Espanola, the police moved into their new detachment building, which is on No. 17 Highway at McKerrow, in October. This is a single-storey structure, 156 feet by 34 feet and consists of living quarters, general office, courtroom and magistrate's office. There is also a three-car garage.

At Kenora, a new boathouse was erected and the old boathouse demolished. Extensive shore protection work, including extension of a concrete retaining wall to link with steel sheet piling was completed.

At Sudbury, a small transmitter building was erected and finishing work was left until spring.

Routine alterations, renovations and maintenance were carried out at Beardmore, Blind River, Bracebridge, Britt, Burks Falls, Campbellford, Central Patricia, Chapleau, Cochrane, Elk Lake, Englehart, Foleyet, Geraldton, Haileybury, Hearst, Hudson, Ignace, Kakabeka Falls, Kapuskasing, Kirkland Lake, Little Current, Mattawa, Minaki, Nipigon, North Bay, Port Arthur, Rainy River, St. Thomas, Sault Ste. Marie, Schreiber, Shabaqua, Sioux Narrows, Smooth Rock Falls, Sturgeon Falls, Sudbury, Temagami, Timmins and Woodstock.

#### **COURT HOUSES AND REGISTRY OFFICES**

Major renovation of the main section of the Sudbury district Court House is nearing completion. Workmen are panelling various courtrooms



The renovated main Court Room of the district Court House, Sudbury.

and judges' offices, installing light fixtures, furniture and equipment. The Registry Office and Court House areas are landscaped and paved.

Substantial work was carried forward from the previous year at Sault Ste. Marie Court House. This involved erection of partitions, relocation of offices, panelling, considerable plastering and the work of various mechanical services.

Routine maintenance and renovations were carried out at the following Court House and Registry Offices: Algoma-Manitoulin (Gore Bay), Kenora (Kenora), Muskoka (Bracebridge), Nipissing (North Bay), and Temiskaming (Haileybury); and at the Parry Sound (Parry Sound) Court House, Rainy River (Fort Frances) Court House, and Thunder Bay district (Port Arthur) Court House. The old Registry Office on Court St. in Port Arthur is being demolished.



The district Court House showing night floodlighting, Sudbury.



View, following renovation, of Court Room "A", Extension No. 2, district Court House, Sudbury.

#### FIRE MARSHAL

A concrete slab and metal shack was constructed for fire demonstration purposes and erection of a sprinkler building was undertaken, at the Gravenhurst Fire College. Various concrete slab installations were made for demonstration purposes in the fire training area.

# For The DEPARTMENT OF EDUCATION

Construction of the new Assembly Hall at the Ontario School for the Blind, Brantford, was completed in March 1961, and all work finished on the intricate organ installation. Placing of special equipment was in progress, and installation of outside services well advanced. This project was started in September 1959. The building is a one-storey structure of brick bearing wall construction, the first floor being concrete slab and beam construction providing pipe space and mechanical equipment rooms at basement level. All rooms are outside rooms with the exception of the auditorium.

A junior school addition was built during the year. Preparation and excavation of the site for this 157 feet by 29 feet extension began in June 1960, and the project was finished November 30, 1960. The new building is one-storey and is to the north of the existing school facing toward Parkside Drive. It contains four classrooms.

Reconstruction of the powerhouse was substantially completed the previous year. In April 1960, the entire project was finished.

The eight-room Hamilton Teachers' College addition, which was started in February 1960, was finished in March 1961. It is on the west side of the existing building. About 116 feet by 96 feet, it is two storeys high with heating space, brick and tile construction and faced with stone to match the original structure.

Clearing of the site of the new Teachers' College, Port Arthur, began on April 14, 1960. Interior work is well advanced and it was anticipated this would be completed by May 31, 1961, and the entire project by July 1, 1961. Shipments of furniture were being received. Outside work, such as completion of driveways and landscaping, will be started as soon as weather permits.

The new teachers' college is the first to be built in that large section of the province west of North Bay. It is strategically situated, being sited on Oliver Rd. at Lyon Ave. on high, commanding land. It is adjacent to, and east of the new Lakehead College of Arts, Science and Technology. The two-storey building is faced with buff brick on steel frame with a small partial basement to house the boiler room. There is a main wing about 100 feet long containing the classrooms and offices, with a large transverse wing at one end providing for gymnasium and auditorium, each approximately 45 feet by 85 feet, and a further one-storey extension for a modern well-equipped cafeteria. In the main wing there will be industrial arts and science classrooms on the first floor, and a library, home economics and art rooms, and two large general classrooms on the second floor. Teachers' and administrative offices, and student and staff washrooms are located on both floors. The auditorium and gymnasium areas occupy the full height of the building. The auditorium with sloping floor has fixed seats for 200 to 250 students and a completely equipped stage and projection room. The gymnasium is completely equipped, having a badminton and two basketball courts. Separating the auditorium and gymnasium on the second floor level is a students' common room, 48 feet by 23 feet, and at first floor level are change rooms, dressing, shower and locker rooms. At the rear of the building is a playing field together with student parking areas to complete the college facilities.

Three classrooms, each 94 feet by 24 feet, were added to the Western Ontario Institute of Technology at Windsor. Construction started in September 1960 and is now completed with the exception of landscaping and special equipment installations, and the staff and students moved into the new quarters on March 13, 1961.

The three separate buildings contain classrooms, laboratories and motor dynamics with lunchroom, tuck shop and washroom facilities also provided.

As part of the winter works program, demolition of three old school buildings and a cafeteria was carried forward at the Ryerson Institute of Technology in Toronto. This work is about 80 percent completed. When this project is finished it will provide space for Unit No. 3 of the new buildings project.

Minor work was undertaken at various other centres including the Provincial Institute of Trades, Toronto; Toronto Teachers' College; Provincial Institute of Mines, Haileybury; Institute of Technology, Hamilton; Ontario Leadership Athletic Camp, Longford Mills, and the North Bay Teachers' College.

# For The DEPARTMENT OF HEALTH

The planning or construction of more than 3,000 mental hospital beds for the Department of Health was under way during the fiscal year.

At Hamilton, 600 new beds were put in service; at Cedar Springs, the 1,250-bed Hospital School for Retarded Children was being rushed to completion; at Port Arthur, the 300-bed medical-surgical wings were more than half finished; at Goderich, a new 300-bed community mental hospital was started and tenders were called for a similar hospital at Owen Sound. At Gravenhurst, the former sanitarium was purchased and space for some 300 beds for children from the Orillia Hospital School was provided. This will permit one of the older sections of the Orillia Hospital to be evacuated, demolished and rebuilt to modern standards. In addition to planning the new 300-bed wing for Orillia, the Department was planning a new 300-bed hospital for Palmerston and the 600-bed Toronto Psychiatric Hospital.

The new wings of the Ontario Hospital, Hamilton, were turned over to the Department of Health in an official opening ceremony October 5, 1960, at which the Hon. Ray Connell, Minister of Public Works, handed the keys to the Hon. Matthew B. Dymond, Minister of Health.



Aerial view of the Water Plant, Ontario Hospital Training School for Retarded Children, Cedar Springs.

Cedar Springs Hospital School for Retarded Children, on No. 3 Highway southwest of Chatham, was the biggest project under construction for the Ontario Government during the year. The 1,250-bed hospital, a multi-million dollar job, was structurally completed during the early part of the year, and at the end of March 1961, the only work remaining to be done was the usual clean-up items. The buildings comprising the main group which have been completed are the male and female pavilions, male and female dining halls, service kitchen, vocational training, medicalsurgical, laundry, trades building, powerhouse and garage building. In addition, the separate water treatment and sewage treatment plants were finished and put into service. The permanent roads to and around the buildings were built, and rough grading of the lawns, terraces, etc., was done in preparation for landscaping. Furniture, furnishings and equipment for the numerous buildings were arriving on the site and work of placing these items was in progress. An average daily work force of 350 men, all trades, was employed on the project during the year, and three-quarters of a million man hours of work were provided for workers who were predominantly residents of the area.

Preliminary work for the construction of a new 300-bed mental hospital was started in November 1960 on a site about two-and-a-half miles south of Goderich on No. 21 Highway. The Goderich hospital is part of the new concept in the treatment of mental illness and will be more in the nature of a home for the aged than the popular idea of a mental hospital. It will consist of a series of single-storey cottages joined to twostorey administration and service wings. There will be no long corridors or institutional atmosphere. Interior decor will be bright and attractive with direct access from cottages to courtyards. Included in the project are services and facilities to allow for future expansion of the hospital according to local needs. The administration area will consist of a central two-storey block and will include an active treatment wing, kitchen and dining room sections, an auditorium, occupational therapy and chapels. The infirmary section will include male and female patient wings and a third section to accommodate essential services such as laundry, trades and power plant. At the fiscal year's end, construction advanced to these stages: forming of the trades building, service walls, and Wing "B" columns, and for footings to Wing "A" and the Administration building was in progress. Reinforcing steel was set up for the north wall and for columns and pier bases in the service buildings. Progress was made roughing in plumbing for the trades and service buildings. Backfilling of weeping tile at the trades building was well advanced and work was under way building the temporary roads around the site.



Perspective drawing of the new mental hospital for the aged now under construction at Goderich.

On February 24, 1961, tenders were called for the construction of a new mental hospital to be built at Owen Sound. This new hospital, as in the case of Goderich, is planned to accommodate about 300 patients and is similar to Goderich in design. The site is approximately 90 acres, situated about one mile east of Owen Sound in the Township of Sydenham in Grey County. Patients whose mental faculties will not allow them to look after themselves in a home for the aged, yet are not altogether in need of full-time bed care, will make up the bulk of the patients. Like Goderich, this hospital will be a complete departure from the old style institutional type. Traditional long corridors are eliminated. Single-storey cottages and two-storey wings with a minimum of restriction for patients are featured throughout. Interior decor will feature domestic pastel shades and an extensive use of glass. Ample day rooms and recreational facilities will create a homelike atmosphere. Bright coloured vinyl flooring throughout is planned to reduce noise and create a pleasing general appearance.

Erection of a 300-bed clinical services group of buildings at Port Arthur advanced to approximately 55 percent completion. The new unit is located between the existing administration building and the kitchenreception building on the Ontario Hospital site. It comprises three wings—the central building, male, and female wings. Each will be connected by passageways to the existing administration and kitchen-reception buildings. The central building, by December 1960, was closed in, roofing and flashing finished, exterior windows glazed and concrete coping at exterior walls completed. By March 31, interior masonry walls were substantially erected

including placing of metal door frames; placing of levelling slab, waterproofing, and rough basement floor slab finished; terrazzo and tile work, lathing and plastering in progress with roughing in of plumbing, heating and electrical work almost completed and ventilating ductwork nearly done. Both male and female wings were closed in with most windows glazed by



Construction progress of the new Clinical Services Building, Ontario Hospital, Port Arthur.

January 1961. By March 31, work advanced on placing roof slope fill and pouring concrete coping at exterior walls. Erection of masonry partitions and placing of furring tile at exterior walls was under way, and roughing in of plumbing, heating and electrical work in progress. A powerhouse addition was started in August 1960 and is about 65 percent completed.

Construction of an addition to the radiation protection laboratory, north block, at the Central Laboratory (360 Christie St.) Toronto, was essentially completed. Building began on April 6, 1960. The building will be used for the measurement of environmental radio-active contamination of such things as water, milk, food or rain as it affects the safety of the public. The structure is 100 feet 10 inches long and 51 feet wide, single storey, with partial basement 51 feet by 23 feet, at the south end. It projects off the present building pointing north toward Melita St. Foundations are of concrete block and exterior walls of buff brick with concrete block back-up. The roof is constructed of long span joists with precast roof slabs. There is radiant heating in the floor. Ventilation has been designed as a three-stage operation — roll type filter, electron precipitor and water wash. Temperature controls must remain within the ratio of plus or minus two of 70 degrees. Another feature is that all services are furred in the walls. Windows are false.

The new dining room and serveries at the Ontario Hospital, Toronto (999 Queen St. W.), under construction since 1959, were completed and ready for use in January 1961. These services are contained in two new additions to the main building on the southerly side. They are three storeys in height with part basement. The new laundry building, similar in plan to that at the Ontario Hospital, Hamilton, was finished and put into operation in October 1960. This building is about 241 feet by 102 feet, one storey, brick and block construction on structural steel frame.

The Ontario Hospital at Thistletown is the new home for the care and treatment of disturbed juvenile patients. The big event at this hospital was the completion of the new gymnasium and swimming pool which serves as an important recreational factor for the children. The building is 103 feet by 121 feet. The foundation is 16 inches thick. A new one-storey electrical building adjacent to the heating plant was completed in January 1961. It is of concrete block and four-inch brick veneer construction, about 24 feet by 56 feet, and was built to house machinery for emergency power supply for the institution. The diesel sets have been tested and accepted.

At the Toronto Psychiatric Hospital major changes were made on the fourth floor of the main building in order to provide a new biochemistry laboratory.

Erection of two 33 foot by 23 foot additions to the dining rooms at the male and female pavilions of the Ontario Hospital at Whitby was started in September 1960. The project included the extension of two existing floors as well as the reconstruction of the serveries and installation of two elevators. Both buildings were completed. Two small distribution buildings with unit sub-stations were built with units established.

Renovation of the old chest diseases unit was the biggest job at the Ontario Hospital, Woodstock. This work embraces the kitchen and dining hall building, cottages "A" and "B", "E" and "F", 5 and 6, as well as the reception building which, when finished, will be known as the Out-patients' Clinic. The first phase of the project included all of these buildings with the exception of cottages "F" and 6 which will be done by contract. This has been a complete renovation job with steady progress maintained throughout the year. Construction of a new incinerator building adjacent to the power-house started in August 1960, and was completed in November. The building is one-storey, 19 feet by 22 feet, of brick and concrete construction. It contains a sterilizing unit for washing and sterilizing cans.

Renovation work continued at the Psychiatric Institute for Children at Byron, near London. The first phase at the Pratten Building was completed in March 1960. The second stage began September 15, 1960. This project consisted of complete replacement of plumbing, electrical and kitchen equipment, carpenter work and painting to transform this pavilion of the former Adam Beck Sanitorium into a children's psychiatric hospital. The major part of this work is now finished. Outside painting, the fire alarm system and some small details remain to be done. General renovation and redecoration including minor mechanical work was carried forward at Edgewood House, Florence Nightingale residence, Glenhurst House, and Wilmart House. The former Preventorium Building has undergone complete renovation to serve as a nurses' training centre. The work started June 1, 1960, and was completed September 15, 1960. The job involved complete replacement of plumbing, electrical wiring, interior and exterior painting and carpentry work.

Various minor projects were carried forward in all divisions of the Ontario Hospital at Kingston.

Renovation work at the hospital school at the Ontario Hospital, Orillia, was carried forward from the previous year to completion. Cottage "B" is being demolished. Cottage roofs were repaired.

In Toronto, property was purchased for the establishment of an Alcoholism Research Foundation Clinic on Harbord St. containing an apartment house and several residences. Present plans call for retention of the apartment building for conversion into offices and demolition of most of the houses to provide for open grounds patient treatment, and parking areas. Demolition of 11 houses began on August 29, 1960 — one house on Harbord and ten on Huron St. Personnel of the Foundation are occupying the apartment building at 24 Harbord St. in addition to two apartments at the rear of the adjoining drug store at 20 Harbord St. Renovation of three houses — 8, 10 and 12 Harbord — is well advanced.

Minor work was also done at Ontario Hospitals at Aurora, Cobourg, New Toronto, Penetanguishene, St. Thomas and Smiths Falls.

## For The ONTARIO HOSPITAL SERVICES COMMISSION

Construction of the Head Office building for the Ontario Hospital Services Commission was completed during this period. Erection of the building began in August 1958, exterior work was finished in December 1959, and interior work advanced during this past year until its completion in November 1960. The structure is 10 storeys and basement with ancillary garage. It is immediately south of Eglinton Ave. on the east side of Yonge St., in Toronto.

Another new venture, begun in February 1961, is the Nightingale School of Nursing building located at Elm and Murray Sts. in the University Ave. area in Toronto. The new school will provide accommodation



Photograph of model shows the two lower administrative floors and six upper resident floors of the new Nightingale School of Nursing, Toronto.

for 138 resident student nurses in a six-storey slab block raised above two academic and administrative floors. The residence-school will be linked to Mount Sinai Hospital with a pedestrian and steam tunnel to provide heating

from a central plant. It will be under the auspices of the Ontario Hospital Services Commission, but will be operated independently through a board appointed by the commission. To help overcome the shortage of nurses, the course of training will be carried over a two-year period instead of the present three-year course. The course will consist of concurrent classroom instruction and nursing experience in wards and related clinical areas. Each of the six resident floors will provide individual rooms for 23 nurses, a communal sitting room, kitchenette, bathrooms, washroom and toilet facilities, linen room, utility rooms, and either a sewing room or a small laundry room. On the first floor, a sunken lounge, dining room and recreation room will overlook a paved terrace to the west. Elsewhere on the first floor will be the resident supervisor's suite and office and a medical suite. Around the central service core on the second floor will be a library, demonstration room, four classrooms, science laboratory, nutrition laboratory and staff and administration offices. In the basement will be an assembly room, stage, laundry room, storerooms and other accommodation for mechanical and servicing needs. Two stairwells and two elevators will serve all floors. Hermetically sealed double glazed windows will be used in the main entrance foyer, lounge, dining and recreational rooms. The fan room and elevator machinery room will be located in a penthouse. The structural system is to be of reinforced concrete. Reinforced concrete columns supported on concrete caissons will bear on solid rock. Concrete beams support a concrete joist and floor system. Panels between floors will be of a white semi-glazed brick while below the aluminum window frames will be a precast concrete panel. Exposed exterior columns and certain beams will be faced with precast concrete. Interior partitions are to be either masonry or metal stud, special precautions being taken to reduce sound transmission between adjacent rooms. Finishes, generally, on the first and second floors are acoustic tile ceilings, terrazzo, vinyl-asbestos tile or linoleum tile floors and gypsum plastered walls. Certain special featured walls are in wood panels and yet others in panels of vinyl coated fabric. Excavation is about 90 percent finished, all caissons are poured with pouring for footings at the main building finished. All foundation walls, first floor slab and elevator and sump pit walls and floor are poured and footings for the garage, incinerator and assembly rooms completed. First floor slab and foundation walls were provided with sleeves and duct openings and electrical conduit was set and poured with slab at the end of March.

## For The DEPARTMENT OF HIGHWAYS

The building program for the Department of Highways was focussed primarily at Burlington, Ottawa and Grafton.

At Burlington, a new office building and a Skyway Toll Plaza Administration Building were completed to add to the department's other facilities on this site. (An 11-bay patrol storage garage was built in this same area in 1959.) The standard plan office building is located immediately north of this 11-bay garage building. Construction started in February



The recently completed district Office Building, Burlington.

1960. It was finished in October 1960. The new office is about 141 feet by 50 feet, of brick and concrete construction and tar and gravel roof. The building was taken over by the Department of Highways on October 24, 1960.

In April 1960, construction of the Skyway Toll Plaza Administration building was started. Highways personnel moved into the building on November 29, 1960. The standby generator unit was ready for emergency use in March 1961. This is a two-storey and basement structure situated on the east side of the roadway at the south end of the Skyway. It will house the administration staff, tanks and equipment for the snow melting system installed by the department in the roadway slab at the approaches to the toll gates. A service tunnel under the roadway connects the administration building with the standby generator building erected on the west side.

Early in 1961 construction of a new 10-bay garage was begun at Grafton. The new garage will serve the area between Cobourg and Colborne and is situated just north of Grafton on Highway 401. The building will be one-storey, 198 feet long, 42 feet wide and 19 feet in height. It will be

of brick, concrete block and steel joist construction with flat roof and concrete foundation. Contained in the structure will be 10 garages with wooden overhead doors, tool and storage rooms, lunchroom, washrooms and a small office. Work has advanced to the 20 percent completion stage.

A number of partition changes were made at the new administration building at Downsview to facilitate smooth operation for the various branches of the department. Work on the watermains and hydrants to service this building was finished and installation of outdoor lighting completed. Relocation of IBM services is presently in progress. A new IBM system has been received, and these machines along with existing IBM equipment have made it necessary to relocate about 90 percent of the machines in both the IBM and computing rooms. To service this equipment and provide proper room temperature an additional seven-and-a-half ton air conditioning unit is being installed to operate along with the two existing seven-and-a-half ton units. Department of Public Works forces are installing the new unit. Power demands were stepped up necessitating additional power from the low voltage room in the floor below.

At Ottawa, a new district office building, begun in July 1960, was completed and occupied on February 22, 1961. The building was officially opened by the Hon. Frederick M. Cass, Minister of Highways, on Monday, March 6, 1961. The new office building is located on a site on Tremblay



The new district Office Building, Ottawa.

Rd., near the intersection of St. Laurent Blvd., on the same property as the 14-bay divisional garage built two years ago. The new building is two storeys, brick with stone facing. Size of the structure is 141 feet by 49 feet. On the first floor is a large general office, boiler and electrical rooms, offices for the municipal, construction and highways' engineers, clothes room, lunch room, vault, janitor's room and locker room, men's washroom and a large storage space. The second floor comprises a large general office, washrooms for men and women, a room for accounting machines, printing room, and rooms for the district accountant, maintenance engineer and district engineer. The boardroom and space for telephone equipment and telephone reception switchboard are also located on this floor.

Construction of a 5-bay steel patrol garage was completed at Wawa in October 1960. Power lines were installed and hooked up, plumbing installations finished and a heating plant installed.

Routine alterations and maintenance were done at Blind River, Kenora, New Liskeard, North Bay, Sault Ste. Marie, Sudbury (McFarlane Lake), Thessalon and Vermillion Bay.

## For The DEPARTMENT OF LANDS AND FORESTS

On May 19, 1960, erection of an 11-bay District Office building was started at Geraldton. The building was substantially completed and occupied by the Department of Lands and Forests February 15, 1961. Only minor items of work remained to be finished and most of the furniture and equipment had been received at the end of March. Landscaping, driveways and the parking area were to be finished under separate contract.



The new District Office Building at Geraldton.

This is a two-storey building, 140 feet by 41 feet, located at the junction of Second St. and Beamish Ave. and immediately east of the Geraldton High School. Construction is of concrete floors, open web steel joists, flat roof, plaster on the interior and brick on the exterior. On the first floor is a large general staff office, nine individual offices for departmental officials, vault, boiler room, duplicating and stock rooms, restrooms, washrooms and space for the telephone receptionist and telephone equipment. On the second floor are two large offices, seven individual offices, lunchroom, laboratory, equipment storage rooms, refrigeration equipment room and stock walk-in rooms, and washrooms.

Park Concession building at Kakabeka Falls, substantially completed in March 1960, had all interior work finished by the following May. The building has been in use since May 24, 1960.

Erection of a six-room biologist's residence is in progress at Kenora. Construction started in September 1960. Plastering was finished in December, temporary heat supplied and the project closed down. The job was resumed March 27, 1961, with placing of wood trim in progress. Construction stands at 60 percent.

The Chief Ranger's Headquarters at Pembroke was substantially completed and occupied on February 15, 1960. Minor items of work and landscaping were undertaken during the year to entirely complete the project. This structure is located on the edge of the Ottawa River. It is 141 feet seven inches by 157 feet seven inches, one-storey at one section and two storeys in the other.

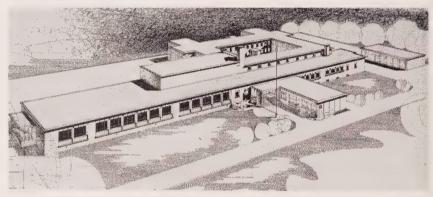
A fireproof records storage vault was added to the Fisheries Research Station at South Bay Mouth. Overall measurements of the addition are 14 feet by 22 feet with a passage six feet long by five feet wide separating the vault from the north side of the main building.

Work continued on installation of a temperature and humidity control system for the three growth rooms in the Pathology building at the Southern Research Station at Maple. At this time there are still a considerable number of tests to be run to conform to Department of Public Works specifications. The growth rooms being of a scientific nature require many trial and error tests before being adopted. At present, one growth room is in continual use.

Routine alterations and renovations were done at the Chatsworth Trout Rearing Station, Elk Lake, Foleyet, Normandale Bird Farm and Fish Hatchery, Stonecliffe, Swastika; and at the hangar for the air services division at Sault Ste. Marie.

## For The DEPARTMENT OF REFORM INSTITUTIONS

Operations began on August 15, 1960, for the construction of a new Girls' Training School to accommodate 130 girls at Lindsay. The project is about 35 percent completed. When finished, this institution will look like a modern High School building from the highway. The girls will have individual rooms for sleeping and day rooms for group activities in the two-storey residence section. Attached will be a single-storey wing with eight classrooms. There will be an auditorium and gymnasium and, at a later date, playing fields will be laid out. The emphasis will be on freedom within the bounds of the institution and training for rehabilitation. The interior decor will be attractive which, it is hoped, will contribute to rehabilitating the girls. The girls will be taught sewing, home economics,



Perspective drawing of the Girls' Training School now under construction at Lindsay.

arts and crafts, and academic subjects. There will be full medical facilities and psychiatric care will be provided. A minimum of staff quarters is being provided as it is expected most of the staff will live in Lindsay or nearby centres.

Tenders were called in February for the construction of a new Boys' Training School at Simcoe. The site is south of No. 3 Highway on Ireland Rd. near Victoria St. in Woodhouse Township, about half a mile southeast of Simcoe. The two-storey brick and concrete structure will accommodate 125 boys and it is almost identical in design to that now being built at Lindsay. A psychiatric unit will be near the administration area. There will be a single-storey wing of eight classrooms with auditorium and gymnasium nearby. Sleeping accommodation will be in eight small dormitories with four beds in each and the remainder in individual bedrooms.



Progress of construction of the new Girls' Training School, Lindsay.

There will be four detention cells. In addition to vocational shops and other instructional areas, a chapel will be included in the building. Boys sent to this school will be those who are amenable to the treatment and training this type of institution provides and will be subject to the usual discipline customary in the training school system. While the emphasis will be on the academic and vocational program, there will be individual and group therapy sessions as well as individual counselling.

The new powerhouse at the Industrial Farm, Burtch, was finished in September 1960. Erection of this structure began in November 1958. It is a one-storey building with basement walls of concrete construction, concrete block interior and brick exterior, 20-year bonded roof supported on massolin joist and brick chimney with 15-foot base.

Erection of a new powerhouse, which will be a replica of that at the Industrial Farm, Burtch, was started in February, 1961, at the Ontario Reformatory, Mimico. The new powerhouse is approximately 90 feet by 59 feet. It will be a one-storey building with foundation walls of concrete construction, concrete block interior and brick exterior. It will contain an engineer's office and workshop, washroom with showers, and generator room for electrical services. The roof will be a concrete built-up roof supported on massolin joist and a 100-feet brick chimney. Foundation work is finished and erection of brickwork is in progress.

The contract was let in September 1960 for the construction of two new dormitory buildings and single staff quarters at the Industrial Farm, Monteith. Work started on October 17, 1960. At present, construction is confined to No. 1 dormitory with stage of completion about 35 percent. When completed, the two dormitories will hold up to 240 prisoners. Each building will comprise three floors, including basements, and will be of concrete, concrete block, brick and steel beam construction. The buildings will be situated to the east and west of the present administration buildings.

and each dormitory will have access to the administration building through the basements. Formed in the shape of a cross, one main core will be 100 feet long by 43 feet six inches in width with the transverse section 95 feet by 38 feet. The basement of No. 1 dormitory will have cells and isolation areas in the central section, exercise corridors, mechanical room, janitor's quarters, washrooms and showers. The basement area at No. 2 dormitory will contain a large dining room and kitchen, dish washing room, refrigeration storage areas, staff dining room and mechanical rooms. The first and second floors in both dormitories will have a central guardroom overlooking the dormitories and guards' corridor. There will be two large dayrooms on each floor, washrooms and showers. The single staff quarters is to be of similar construction and will include 18 bedrooms. It will consist of a basement and first floor, 145 feet long and 31 feet wide, with a wing section 42 feet by 22 feet. The basement will be mostly devoted to storage and the first floor to bedrooms. The recreation room in the basement and lounge on the first floor constitute the wing section.

The new dormitory and cells group, accommodating 200 prisoner inmates at Camp No. 5 of the Industrial Farm at Burwash, was completed. Official opening ceremonies were held June 8, 1960. Officiating at these ceremonies were the Hon. George C. Wardrope, Minister of Reform Institutions, the Hon. Ray Connell, Minister of Public Works, and Mr. Rheal Belisle, M.P.P. for Nickel Belt. Many magistrates and important government and civic dignitaries were present on this occasion. Following the ceremony a tour of the institution was made. All items of work on this project were finished in October. The keys were turned over on October 17, 1960, and personnel of the Department of Reform Institutions moved into the building.

Routine alteration and renovation was done at the Burtch Industrial Farm, Camp No. 2 Burwash Industrial Farm, Boy's Training School at Cobourg, Fort William Industrial Farm, Ontario Reformatory at Guelph and the Ontario Reformatory, Millbrook,

#### DISTRICT JAILS

Construction of the three new additions to the existing jail building at Kenora was essentially completed at the close of this year. Exterior landscaping, sidewalks, driveways and parking area remain to be finished. The new extensions materially add to the facilities of the jail, providing 48 men's cells and three cells for male sick bay; 10 women's cells and three cells for female sick bay, as well as four special cells, for a total accommodation of 68. Construction first began in May 1959.

Minor repairs were carried out at Haileybury, North Bay and Sudbury.

## For The DEPARTMENT OF TRAVEL AND PUBLICITY

Construction of a new Tourist Reception Centre is well advanced near the junction of Highways 400, 11 and 27, south of Barrie. The new building is of frame construction with brick veneer on three elevations and a natural cut-stone front. There is no basement. It contains a domestic hot water heating system, washrooms, and "living-in" quarters for the operational manager. The new bureau will serve the many thousands of tourists who have reached the heart of the province and provide them with information about the attractions of the great Lakeland district. Establishment of a permanent information centre at this point was decided upon after a three-year survey. To the north, highways spread out into the lake districts — to Bruce, Manitoulin, the Georgian Bay shore, Muskokas, Haliburton, Algonquin Park, Temagami, Temiskaming, North Bay and Sudbury. To the northwest, via Trans-Canada Highway, many other places of interest are accessible from this point.

General maintenance work was carried out at the following reception centres: Kenora, Middle Falls.

#### HISTORICAL SITES

Plaques marking historical sites were erected at Ansonville, Ingersoll, Oshweken, Port Burwell, Temagami and Woodstock.

## For The ONTARIO WATER RESOURCES COMMISSION

Official opening ceremonies for the new laboratories and research building on Highway 401 in Etobicoke township were held on November 7, 1960. Hon. Ray Connell, Minister of Public Works, presented the official key to the Hon. William K. Warrender, Minister of Municipal Affairs, who officially opened the new building.

This project was started in December 1957 and substantially completed in September 1959. Installation of furniture and equipment took place during 1960. It provides about 53,000 square feet of floor space in the main building and outbuildings.

## For The ONTARIO GOVERNMENT EXHIBITS

The Canadian National Exhibition was held from August 24th to September 10th. This year, as in former years, the Department of Public Works prepared the Province of Ontario Building in Exhibition Park for the annual show with a view to providing a varied and attractive display to maintain the high public interest experienced in former years. Subsequent to the assignment of space to the various departments, this department worked in close co-operation with, and as liaison between the departments planning to exhibit in the show. An attractive background for the exhibits of the various departments was provided.

Exhibiting were the Departments of Agriculture, Attorney General, Commerce and Development, Education, Energy Resources, Health, Highways, Labour, Lands and Forests, Mines, Provincial Secretary, Public Works, Reform Institutions, Transport, Travel and Publicity and Water Resources.

The Central Canada Exhibition was held at Ottawa from August 19th to August 27th, 1960. The Department of Public Works organized and prepared the display area allotted to the Ontario Government by the Central Canada Exhibition Association. Featuring departmental functions of current interest, displays were prepared by the Departments of Agriculture, Commerce and Development, Health, Highways, Lands and Forests, Reform Institutions and Transport.

Preparation of the display area was similar to that at the Canadian National Exhibition but on a much smaller scale. This display proved to be one of the greatest attractions of the Exhibition.

#### **BOILER INSPECTION**

The boiler inspection work of this department as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario government hospitals, Ontario training schools and Ontario reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario hospitals and reformatories, the reports as referred to were sent to the departments of Health and Reform Institutions respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir,

Your obedient servant,

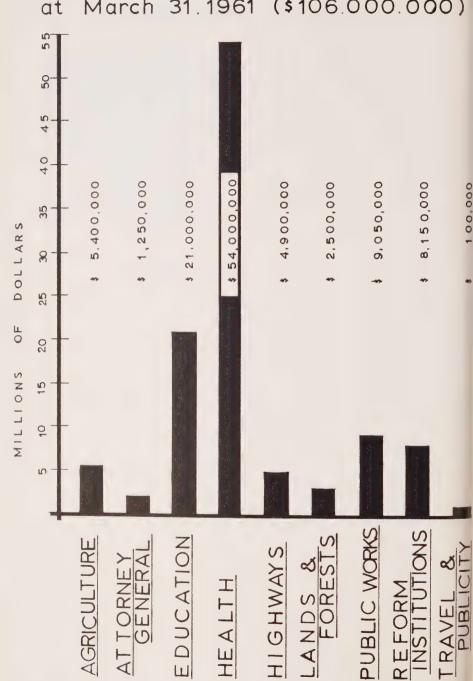
A sauche.

D. G. Creba, Chief of the Architects' Branch.

Toronto, March 31, 1961.

#### ONTARIO DEPARTMENT OF PUBLIC WORK

Estimated Total Value of Work Underway at March 31.1961 (\$106.000.000)



#### REPORT OF THE CHIEF OF THE PROPERTY BRANCH

Parliament Buildings, Toronto, Ontario, March 31st, 1961.

Mr. J. D. Millar, Deputy Minister, Department of Public Works.

The year now ended completes six years of operation which commenced April 1st, 1955, with the transfer of personnel from the Property Branch of the Department of Highways to the Department of Public Works. Our responsibilities then consisted mainly of the purchasing and leasing of property which generally had been selected and proven suitable for the use of the various other Departments prior to our negotiations.

Since 1955, due to the greatly accelerated programs of most Departments and the formation of new Departments, there has been a general increase in the need to purchase sites for the construction of new institutions and to lease property to provide office space and other accommodations. Negotiations have been carried on by members of this Branch on behalf of 20 different Departments and Government agencies and the nature of our work has varied with each assignment. The work performed has been throughout the Province and has varied from the acquisition of a small bush lot to a multi-storey office building. We have recently completed negotiations for the setting up of 41 separate Driver Examination Centres for the Department of Transport located in strategic locations throughout the Province. Such work is continually under way for the various Departments in order that they may carry out their approved programs of operation.

In addition to the volume of work, the individual responsibility of each member of staff within the Branch has substantially increased. This is due to the onus now on the Property Agent, in the majority of cases, to select the property to be leased or purchased in order to meet the requirements of Treasury Board or the Ontario Parks Integration Board.

In May, 1959, a Property Management section was formed within the Branch and proper procedures have been set up to deal with matters pertaining to the requisition of cheques and the payment of rent, collecting rent from Lessees occupying Government-owned property, Fire Insurance and payment of Local Improvement charges and Municipal taxes. The other main responsibility of the Property Management section is the preparation and maintenance of a perpetual inventory of all property under control of the Department. Preparation of the Property Directory is well advanced and the information so far compiled has already proved of value.

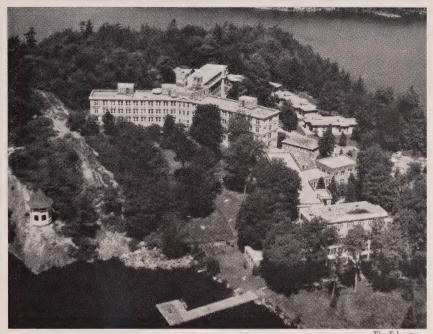
During the fiscal year 2020 cheques totalling \$801,467.52 have been requisitioned by the Property Manager for the payment of rent for leased quarters. The Chief Accountant has been advised that 257 payments totalling \$309,382.23 were due to the Department from Lessees occupying Government-owned property. Payments totalling \$5,290.84 for Fire Insurance premiums and \$69,803.97 for the payment of Local Improvement charges and Municipal taxes have been recommended, approved and forwarded to the Chief Accountant. Within the last 2 years the function of the Property Management section has become important and is efficiently discharging the responsibilities assigned to it. This was borne out in the latest report of the Provincial Auditor when improvements and records pertaining to revenue from Government-owned property were noted.

In November, 1960, the jurisdiction of the Surveys Division was assigned to this Branch. This has enabled a closer co-ordination in the acquisition of property and the preparation of adequate plans of survey of property under the control of the Department. Work is progressing to prepare plans of property already owned and in use in order that up-to-date information will be readily available for the use of other Branches and Departments. This work closely ties in with the preparation and maintenance of an up-to-date Property Directory by the Property Management section.

Also in November, 1960, the responsibilities of the allocation of space outside of the area of Metropolitan Toronto were assigned to this Branch. Work is progressing in this undertaking and as time and duties will permit, all Government-owned properties will be inspected, records maintained and changes in the use made of the porperties will be made where found necessary.

A summary of the purchases, leases and sales completed during the six years of operation is as follows:—

1955-56	<u> </u>	transactio	ns \$	1,744,571.20
1956-57	229	11		6,352,661.65
1957-58	252	11		4,214,092.62
1958-59	<u> </u>	11		2,491,282.43
1959-60	<u> </u>	11		12,453,472.73
1960-61	235	11		3,012,788.52
Total	1281	11	\$.	30,268,869.15



— The Telegram

Aerial view of the recently purchased Muskoka Hospital, near Gravenhurst.

This, however, does not in any way indicate the full responsibilities discharged. Most transactions were completed only after an investigation of numerous properties in order to determine the most suitable for the intended use. Frequently, many hours, days and sometimes weeks of concentrated work is spent to resolve some problem without concluding an acquisition or prior to a proposed scheme being abandoned. Often considerable investigation and negotiation takes place in the interest of public relations or to ascertain sufficient factual evidence to safeguard the interests of the Department. The amount of time and effort in such work is not indicated in the foregoing list of completed transactions but nevertheless is an important part of our work.

The most important negotiation completed by this Branch concerned the purchase of the 4-acre city block immediately to the east of the Parliament Buildings in November, 1959, from the Sisters of St. Joseph at a price of \$5,000,000.00. Coupled with this acquisition are numerous other purchases in order to provide a suitable site to re-establish quarters for the main Departments within the Queen's Park area. There are still some properties outstanding but as negotiations can be completed we will proceed with their acquisition.

Aside from acquiring a site for future construction in the Queen's Park area, a 12-storey office building known as 801 Bay Street at the interesction of College Street has been purchased at a price of \$2,700,000,00. Another major purchase was the 2-storey garage at 832 Bay Street with its 2 parking lots at a price of \$950,000.00 but which is still under lease to Addison Cadillac Oldsmobile Limited.

A few of the recent larger purchases outside of the Toronto area were the Beck Memorial Sanitorium at Byron for \$1,500,000.00, Muskoka Hospital near Gravenhurst for \$900,000.00, and a large tract of land at Long Point on Lake Erie at a total cost of \$231,551.00 for the development of a Provincial Park.

The present staff totals 42 persons which includes 18 persons in the Surveys Division, consisting of Mr. G. B. Wright, O.L.S., Chief Surveyor; his assistant; 4 survey parties and 4 draftsmen. The remaining 24 consist of 10 office staff; 8 Property Agents; 4 Regional Supervisors; Mr. D. G. Dykes, Assistant Chief; and myself.

As previously mentioned, the work performed by members of this Branch is wide in scope and varied in nature, requiring a high degree of personal responsibility both within the office and in the field. At times, due to difficulties in securing adequate staff, it has been necessary to function with little more than a skeleton staff, as the 8 Property Agents and 4 Supervisors are required to look after all negotiations across the Province. It is only with the conscientious effort and co-operation of all members that it has been possible to complete the work described in this report.

During this last year with the incorporation of the Surveys Division into the Branch, along with other changes, and general experience gained by the members of the staff, we are in a much more solid position and I feel that the responsibilities assigned to us are well in hand. Settlements have been arranged for most of the properties under expropriation and where it has been necessary to resort to arbitration before the Ontario Municipal Board, favourable results have been obtained.

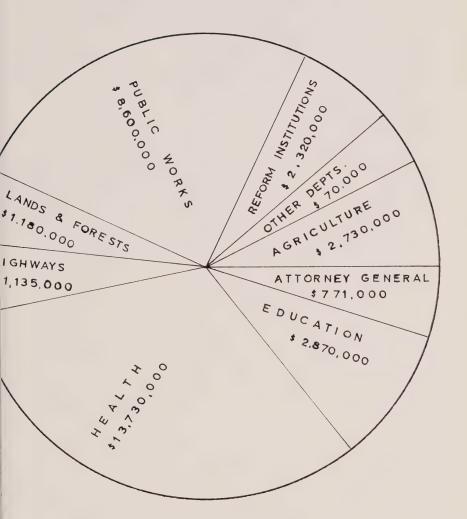
Respectfully submitted,

E. J. Parker, Chief of the Property Branch.

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#### NTARIO DEPARTMENT OF PUBLIC WORKS

# CAPITAL EXPENDITURE 1960-61



NEW CONSTRUCTION and CAPITAL IMPROVEMENTS

\$ 33,406,000

#### REPORT OF THE CHIEF OF THE ACCOUNTS BRANCH

Department of Public Works, Ontario, Toronto, March 31, 1961.

Mr. J. D. Millar, Deputy Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Sir:

I have the honour to submit detailed statements of Ordinary Expenditure of Civil Government and maintenance and repairs of Government Buildings and Public Works; also Capital Expenditures on Provincial Government Buildings and Public Works, during the fiscal year which ended on the 31st of March, 1961.

I have the honour to be, Sir,

Your obedient servant,

A. A. Easson

Chief of the Accounts Branch.

A A. Easson

#### REPORT OF THE DEPARTMENT OF PUBLIC WORKS

Fiscal Year Ending March 31st, 1961

#### REPORT OF THE ACCOUNTANT

The following figures show a decrease in the operation of the Department from the previous year, largely accounted for by transfer of the Ontario Water Resources Commission from the Department of Public Works to the Department of Municipal Affairs.

#### **EXPENDITURES**

Fiscal Year	<i>Ordinary</i> \$11,038,232.84 10,803,113.99	Capital	Total	
1959-60		\$53,624,110.90	\$64,662,343.74	
1960-61		32,066,919.48	42,870,033.47	
Percent Decrease	\$ 235,118.85	\$21,557,191.42	\$21,792,310.27	
	2.13%	40.20%	33.70%	

#### SUMMARY OF EXPENDITURES

#### For Fiscal Year April 1st. 1960, to March 31st, 1961

Service	Ordinary	Capital	Total
Main Office —	Ť	-	
Administration			
expenses, etc.	\$ 1,272,076.47		\$ 1,272,076.47
Maintenance and Repairs			
— Government			
Buildings	8,228,773.99		8,228,773.99
Public Works — Dams,			
Docks, Locks, etc.	108,595.67	\$ 850,584.12	959,179.79
Public Works — Aid to			
Drainage	644,100.50		644,100.50
Public Buildings		31,216,335.36	31,216,335.36
Miscellaneous	549,567.36		549,567.36
Total Net Expenditure	\$10,803,113.99	\$32,066,919.48	\$42,870,033,47

#### STATEMENT OF REVENUE

Commissions on telegraphs and telephones Sale of material Rentals Perquisites Building Equipment Miscellaneous Sale of property	\$ 16,493.37 11,214.21 338,990.35 3,916.00 2,048.55 4,868.11	\$ 25,000.00 160,308,38	\$ 16,493.37 36,214.21 338,990.35 3,916.00 2,048.55 4,868.11 160,308.38
Sale of property	\$ 377,530.59	\$ 185,308,38	\$ 562,838.97

## STATEMENT OF EXPENDITURES, MAIN OFFICE, MAINTENANCE, REPAIRS AND CONSTRUCTION OF PUBLIC BUILDINGS

For Fiscal Year Ending March 31st, 1961

#### ORDINARY

Service	Amount		Amount
MAIN OFFICE			
Minister's Salary\$	12,000.00		
Salaries	911,011.84		
Travelling Expenses	21,353.62		
Maintenance	111,342.65		
Insurance	14,201.56		
Local Improvement and Municipal Taxes	44,764.15		
Unforeseen and Unprovided	335.00		
Compensation — Medical, etc., for Injured	00.240.04		
Workmen	89,368.96		
Unemployment Insurance Stamps	67,698.69	Q.	1,272,076.47
		Ψ	1,272,070.47
ONTARIO GOVERNMENT BUILDINGS			
Salaries — Maintenance Staff\$	3,005,598.69		
Maintenance, fuel, light, etc	794,776.93		
Horticulture and Upkeep of Grounds	15,000.00		
Communication Services	665,994.85		
Typewriter Servicing — Toronto			
Departmental Offices	49,947.73		
Furniture, Furnishings and Equipment	34,918.40		
Repairs, Alterations and Incidentals	2,723,375.58		
	7,289,612.18		
Deduct Rentals	3,000.00		
_		\$	7,286,612.18
LEASED PREMISES			
Rentals and Expenses		\$	942,161.81
MAINTENANCE OF LOCKS, BRIDGES, DAMS AND DOCKS, ETC.			
Maintenance		\$	108,595.67

Service	Amount	Amount
AID TO DRAINAGE		
To provide for grants in aid of drainage work in accordance with The Provincial Aid to Drainage Act, 1954\$	599,998.97	
Salaries and expenses in connection with preparing drainage schemes and for construction, improvement or re-construction of trunk channels for farm drainage in Northern Ontario, including expenses in connection with drainage works which may qualify for grants under The Pro-		
vincial Aid to Drainage Act, 1954	31,331.05	
Municipal Drainage, including grants in aid therof	12,770.48	\$ 644,100.50
MISCELLANEOUS		
Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith\$	34,492.98	
To provide for expenses arising from unforeseen circumstances or for which no provision has been made, as may be directed by the Lieutenant-Governor in Council	77,733.00	
To provide for grants towards the cost of construction of new jail accommodation as may be directed by the Lieutenant-Governor in Council	232,224.25	
Aid — Dredging — Muskoka Dredging in the Muskoka Lakes	5,180.30	
Aid — Remedial Works, etc. —		
Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor		
in Council	199,936.83	\$ 549,567.36
TOTAL ORDINARY EXPENDITURE		\$10,803,113.99

#### CAPITAL

Service	Amount	Amount
PUBLIC BUILDINGS		
To provide for the construction of new buildings and works, purchase of lands and buildings, alterations, equipment and extension of services to existing buildings and works and the purchase of construction plant and equipment and materials for stores and expenses in connection therewith.		\$31,216,335.36
DAMS, DOCKS AND LOCKS		
Construction of dams, docks and locks		850,584.12
TOTAL CAPITAL DISBURSEMENTS		\$32,066,919.48
SUMMARY		
ORDINARY EXPENDITURE		
Main Office, Maintenance and Repairs of Government Buildings		\$10,803,113.99
CAPITAL DISBURSEMENTS		
Public Buildings and Public Works		32,066,919.48
		\$42,870,033.47

A. A. EASSON, Chief of the Accounts Branch

TORONTO, March 31st, 1961

## REPORT OF THE CHIEF OF THE CIVIL ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31st, 1961.

Mr. J. D. Millar, Deputy Minister, Department of Public Works.

The work performed under the supervision of the Chief of Civil Engineering during the fiscal year 1960-61 was as follows:

#### 1. HYDRAULIC SECTION

(A) DAMS, DOCKS, LOCKS, ETC.

#### Summary:

The investigation, pre-engineering, design, construction, inspection and approval of the work on dams, docks, locks, etc., was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas. Dredging work in the Muskoka area was resumed.

Two concrete dams, one shore protection project and a system of floating docks previously commenced, were completed. Seven concrete dams and one rock filled dam were started this year and were completed. Work on one rock filled dam, one timber crib dam and one concrete fishway was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

#### BAYSVILLE DAM, Township of McLean, Muskoka District

Reconstruction of the dam proper was carried out last fiscal year and on March 3, 1960, the dam was put in operation with its full discharge capacity.

This year, clearing of the river bed downstream, grading of the earth fill on both river banks, fencing and landscaping of the surrounding area were carried out.



The completed Baysville Dam.



Opening ceremonies, July 20, 1960, showing part of the large crowd in attendance

On July 20, 1960, the dam was officially opened by Prime Minister Leslie M. Frost, assisted by the Honourable Ray Connell and Robert J. Boyer, M.P.P. for Muskoka. A bronze commemoration plaque was placed on the westerly pier.

#### BLINDFOLD LAKE DAM, Kirkup Township, Kenora District

The old timber crib dam at the outlet of Blindfold Lake was installed many years ago by lumbering interests. It has been partially washed out by spring freshets and does not maintain water level in the lake. In connection with the developing of tourist trade and new recreational areas, the Department of Lands and Forests requested reconstruction of the dam.

During the early spring of 1961, work on building the access road was carried out. Reconstruction of the dam will be carried out next year.

#### LAKE DORÉ DAM, Township of Wilberforce, Renfrew County

The Department of Lands and Forests requested the reconstruction of the old timber dam across Snake River near the outlet of Lake Doré. The old timber dam had deteriorated beyond repair and was no longer capable of maintaining suitable water level in the lake. The dam was reconstructed with reinforced concrete and earth fill as designed by the Civil Engineering staff. The work was completed on September 30, 1960.

The new dam rests on a reinforced concrete foundation slab which is 86 feet long, 26 feet wide and two feet thick. The slab is shaped in such a manner that it serves as the floor of a stilling basin, 18 feet long and 47 feet eight inches wide. The total length of the dam, including the earth filled wing walls, is 420 feet. It has two 14-foot sluiceways. The head of water from the sluiceway sill to the controlled water level is seven feet and the top of the deck is four feet six inches above this level. The sluiceways are fitted with steel chases and timber stop logs. The deck of the dam is 41 feet long, 15 feet wide and 16 inches thick. It is designed to be strong enough for use by vehicles.

#### GO-HOME LAKE DAM, Gibson Township, Muskoka District

The Department of Lands and Forests requested that a dam be constructed at the outlet of Go-Home Lake to maintain the water level of the lake.

The new dam was designed by the Civil Engineering staff of this Department and the construction work was carried out this fiscal year.

The south outlet channel of the lake which discharges water into the Gibson River was selected as a suitable site for the dam. This channel was closed by a rock filled type cofferdam and the site was dewatered. In order that the new dam would be capable of passing the maximum flow, which may be discharged by the power plant of the Ontario Hydro-Electric Power Commission at Ragged Rapids, extensive widening and deepening of the outlet channel was carried out.

The west outlet channel of Go-Home Lake which discharges the flow into Georgian Bay was also deepened and widened to serve as a bypass during the construction period when the south outlet was closed.

The new reinforced concrete dam is 95 feet long. It has four 14-foot sluiceways. The head of water retained by the dam, measured from the sluiceway sill to the regulated water level, is 10 feet and the top of the deck is five feet above this level. The sluiceways are fitted with steel chases and timber stop logs. The deck of the dam is 84 feet long, 12 feet wide and 12 inches thick.

The dam in the south outlet of the lake was completed, the cofferdam was removed, and all flow from the lake discharges through the new dam. The west outlet channel of the lake was closed by a porous rock filled dam which discharges a restricted quantity of flow. This flow is sufficient for maintaining a small falls below the dam but at the same time is so small that boats can safely navigate through the west channel down to the rock filled dam. From there on, a passway was built along the northerly bank of the channel to serve as a portage for carrying canoes. The passway was so designed that in the future it can serve as a foundation for a marine railway.

#### KENOGAMISIS LAKE DAM, Houck Township, Thunder Bay District

Construction of a dam at the outlet of Kenogamisis Lake was requested by the Department of Lands and Forests. Control of water level in that lake was considered necessary for the operation of the Lands and Forests air base at Geraldton and for developing parks and recreational areas.

During the fall of 1960 an access road to the site was constructed and foundation exploration drilling was carried out. The new dam was designed in reinforced concrete by the Civil Engineering staff of this Department. Excavation of the bed rock was started for widening and deepening the by-pass channel.

The construction work will be carried out during the next fiscal year.

### SHORE PROTECTION AT ONTARIO PROVINCIAL POLICE GARAGE, KENORA

The steel sheet piling which forms the main part of the project, was driven last year. This year, reinforced concrete anchoring walls were constructed, steel tie rods were installed and the back filling with rock and gravel was carried out. The area between the garage and the water's edge was graded and levelled. The work was completed in June, 1960.

#### LANG LAKE DAM, Curtin Township, Sudbury District

The dam at the outlet of Lang Lake, on the Whitefish River, was built by lumbering interests early in this century. In 1958 the dam was considered to be deteriorated beyond repair and the Department of Lands and Forests requested its reconstruction.

The dam was reconstructed with reinforced concrete as designed by the Civil Engineering staff of this Department. The project was completed on December 2, 1960.

The new reinforced concrete dam is 268 feet long. It has four 14-foot sluiceways and an overflow wing wall 19 feet long. The head of water retained by the dam, measured from the sluiceway sill to the regulated summer water level, is 10 feet eight inches and the top of the deck is five feet nine inches above that level. The total height of the dam in its sluiceway portion averages 21 feet from the bed rock foundation to the top of the deck. The sluiceways are fitted with steel chases and timber stop logs. The deck of the dam is 84 feet long, 13 feet wide and 16 inches thick. It could serve as part of a bridge deck, if, during the future development of this area, crossing of the river by way of the dam would appear necessary.

#### LYNDHURST DAM, Rear of Leeds and Lansdowne Townships, Leeds County

The water level in Lower Beverly Lake was controlled by two dams across the Gananoque River at Lyndhurst. The dams were built with masonry and concrete by private mill owners about 60 years ago. After the mills had ceased to operate, the dams fell into a state of disrepair and were found to be dangerous to operate. The Department of Lands and Forests requested reconstruction of the dams. In 1960 the old dams and privately owned water rights were forfeited to the Crown and reconstruction carried out. The project was completed on November 24, 1960.

The new dam, which replaced the two old dams, was designed in reinforced concrete by the Civil Engineering staff of this Department.

The dam was based on solid rock. It is 180 feet long with three 14-foot sluiceways and a discharge valve two feet in diameter. The head of water from the sluiceway sill to the controlled water level is nine feet and the top of the deck is four feet above this level. The total height of the dam averages 22 feet from the bed rock foundation to the top of the deck. The sluiceways are fitted with steel chases and timber stop longs. The deck of the dam is 67 feet long, 12 feet wide and 12 inches thick.

#### MAGNETEWAN LOCKS, Chapman Township, Parry Sound District

As a safety measure for operation of the locks and for the pedestrian and boat traffic, six light standards and 700 feet of connecting wiring were installed to provide light on the approach wall, the North Dam and the locks. A small timber wharf, 22 feet long and six feet wide was constructed.

#### MAHZENAZING RIVER DAMS, Carlyle Township, Manitoulin District

The two timber crib dams across Mahzenazing River, one located at the outlet of Mahzenazing (Murray) Lake and another at Collins Inlet, had been built by lumbering interests years ago. They maintained the level of Mahzenazing Lake and the Mahzenazing River respectively as required for log driving and boat traffic.

The old rock filled crib structure had deteriorated and could not maintain the water levels in their storage reservoirs any longer.

The Department of Lands and Forests requested reconstruction of the dams.

The new dams were designed by the Civil Engineering staff of this Department. A type of rock filled crest overflow dam was developed for both sites.

The Mahzenazing (Murray) Lake Dam was completed on August 20, 1960. It is 150 feet long, 12 feet high and up to 160 feet wide at its base. The length of the overflow crest is 125 feet.

The Collins Inlet Dam was completed to the extent that it can pass the freshet flow.

#### FISHWAY AT NICOLSTON DAM, Essa Township, Simcoe County

The Department of Lands and Forests requested that a fishway be constructed at an existing dam in the village of Nicolston near Alliston. The dam was blocking the annual migration of rainbow trout upstream to natural spawning beds.

The fishway has been designed as a reinforced concrete structure to by-pass the dam around its northerly abutment. Construction work commenced on November 20, 1960. Coffer dams were installed, the site de-watered, excavation carried out, a heating system based on a 10 H.P. boiler installed and a temporary building of light timber framework and plastic cover erected as required for concreting in cold weather.

The work is in progress and is scheduled to be completed early next year.

#### OXFORD MILLS DAM, Oxford Township, Grenville County

The dam was constructed last year and was put in operation in November, 1959. Some masonry work of facing the downstream side of the dam was left uncompleted because of cold weather. This year the remainder of the facing stone was placed and the project completed in September, 1960.

#### PORT CARLING LOCKS, Medora Township, Muskoka District

Partial reconstruction of the system of docks for landing of small water craft at the entrance and at the outlet of the locks, started last year, was finished in May, 1960.

The old floating timber dock at the north-westerly corner of the locks was replaced by an extension of the permanent dock and two new floating sections.

At the north-easterly corner of the locks, eight new floating docks were extended into Lake Rosseau from the existing permanent dock.

#### PORT SANDFIELD DOCK, Medora Township, Muskoka District

Major repairs were made to the dock located at the south bank of the river channel under the existing highway bridge.

#### RAVEN LAKE DAM, Township of Sherborne, Haliburton District

The dam at the outlet of Raven Lake was constructed with concrete by this Department in 1930. Leakage had developed under the wing walls between the bed rock and the concrete foundation of the dam. The area around the leaks was dewatered and the eroded cavities plugged with concrete. Concrete piers were also repaired and the stop logs in the sluiceway adjusted. Work was completed on October 5, 1960.

#### SANDFIELD DAM, Township of Sandfield, Manitoulin District

The dam at the outlet of Manitou Lake was originally installed in 1880 by a mill owner. In 1959 the dam was found deteriorated beyond repair and the Department of Lands and Forests requested its reconstruction.

The dam was reconstructed with reinforced concrete and earth fill as designed by the Civil Engineering staff of this Department. The work commenced in May and the project was completed on November 11, 1960. The new dam was based on limestone. The reinforced concrete foundation slab is 76 feet long, 17 feet six inches wide and one foot six inches thick. It is shaped in such a manner that it serves as the floor of a stilling basin 11 feet six inches long and 68 feet wide.

The total length of the dam, including the earth filled northerly wing wall, is 230 feet. The dam has four 14-foot sluiceways fitted with steel chases and timber stop logs. The head of water from the sluiceway sill to the regulated water level is five feet and the top of the deck is three feet six inches above this level. The deck of the dam is 84 feet long, 12 feet wide and 12 inches thick.

#### SHIRLEY LAKE DAM, Preston Township, Nipissing District

Majors repairs were made to the existing timber crib dam at the outlet of Shirley Lake. Sheeting was renewed along the upstream face of the dam and on both sides of the sluiceway. The work was completed in July, 1960.

#### ST. OLA DAM, Limerick Township, Hastings County

The existing concrete dam at the outlet of St. Ola Lake was constructed by this Department in 1934. The Department of Lands and Forests has found that for better discharge of the freshet flood, lowering of the northerly wing wall of the dam would be of advantage. During November and December of 1960, this wing wall was lowered 24 inches by drilling and blasting.

#### DAM AT THUNDER BAY NURSERY, Neebing Township, Thunder Bay

The old timber crib dam across Pennock Creek at the Department of Lands and Forests Thunder Bay Nursery, near Fort William, was found inadequate for maintaining the water levels in the storage reservoir required for irrigation. In 1959 the Department of Lands and Forests requested reconstruction of the dam.



Thunder Bay Nursery Dam, near Fort William.

The dam was reconstructed with reinforced concrete, steel sheet piling and earth fill as designed by the Civil Engineering staff of this Department. Work started in June and was completed on October 6, 1960.

The reinforced concrete foundation slab was made 69 feet long, 24 feet wide and two feet thick. The slab is shaped in such a manner that it serves as the floor of a stilling basin 23 feet long and 16 feet wide. The construction of stilling basins is a new feature in the design and construction of Government owned dams.

The total length of the dam including both earth-filled wing walls is 250 feet. The dam has one 16-foot sluiceway fitted with steel chases and timber stop logs. The head of water from the sluiceway sill to the regulated water level is seven feet and the top of the deck is five feet above this level. The deck of the dam is 24 feet long, 10 feet wide and 12 inches thick.

#### THUNDER LAKE DAM, Township of Zealand, Kenora District

The Department of Lands and Forests requested the reconstruction of an old timber crib dam at the outlet of Thunder Lake, in the Aaron Provincial Park, located on Highway 17 between Dryden and Wabigoon. It was reconstructed this year with reinforced concrete and earth fill, and included a stilling basin, as designed by the Civil Engineering staff of this Department. The work commenced in March and was completed in October, 1960.

The total length of the dam, including both earth-filled wing walls, is about 90 feet. The dam has one 14-foot sluiceway fitted with steel chases

and timber stop logs. The head of water from the sluiceway sill to the regulated water level is seven feet and the top of the deck is five feet six inches above this level. The deck of the dam is 22 feet long, 26 feet six inches wide and 16 inches thick. It is designed as a bridge deck for passage of traffic on a secondary road.

#### LAKE TRAVERSE DAM, Edgar Township, Nipissing District

The old timber crib dam at the outlet of Lake Traverse was partly washed out during the spring freshet of 1960 and reconstruction of the dam was requested by the Department of Lands and Forests.

The dam was constructed in three portions with rock islands in between. The total length of the dam is approximately 350 feet. The total length of the overflow crest is 330 feet.

Construction work was carried out during the winter of 1960-61 and the structure was completed to the extent that it can pass the freshet flow.

#### CURRENT REPAIRS AND MINOR CONSTRUCTION WORK

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the overhauling of stop logs, winches and the painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Dutchman's Dam, Parry Sound District; Magnetawan Locks and Dams, Parry Sound District; Mount Lake Dam, Algoma District; Noganosh Lake Dam, Parry Sound District; Panache Lake Dam, Sudbury District; Pine Lake Dam, Parry Sound District; Pickerel Lake Dam, Rainy River District; Port Carling Locks, Muskoka District; Scott's Dam, Parry Sound District; Shaw (Reserve) Dam, Algoma District; Tube Lake Dam, Algoma District; Tyson Lake Dam, Sudbury District, and Wren Lake Dam, Haliburton County.

#### General

Minor repairs, adjusting of winches, painting of steel parts, replacing of stop logs, etc., were made to 23 dams which are not listed above. Timber protection booms were repaired and replaced in front of 22 dams and seven steel cable guard wires installed across channels upstream from dams for the safety and protection of careless boat operators. Driftwood and beaver dams were removed from 28 dams.

The construction equipment was overhauled and repaired and made ready for use in the ensuing season.

#### (B) AIDS TO NAVIGATION

Two hundred and forty-five floating buoys, 65 spar buoys and 14 rock signs were placed on the navigation routes in the areas of Lakes Muskoka, Rosseau and Joseph; 52 floating buoys were placed in Ahmic Lake, Lake Cecebe and the Magnetawan River; and 50 floating buoys were placed in Lake Vernon, Peninsula and Fairy Lakes, the Muskoka River and Mary Lake.

A program of dredging was commenced that will include the Muskoka River below Bracebridge, the Muskoka River at the Huntsville Bridge and other portions of the rivers and channels in the Muskoka district that have become filled in with silt during the past ten years since the last dredging work was done.

#### (C) LOCKAGES

The records of watercraft which were passed through the three locks operated by the Provincial Government were as follows:

	Boats Over 30 ft. in length	Small Boats	Scows	Total
Port Carling Huntsville Magnetewan	1,786	8,945 1,360 421	10	10,741 1,360 421
	1,786	10,726	10	12,522

#### (D) REMEDIAL WORKS

Grants paid to Municipalities for flood relief, etc.:

County or District	Township	Amount
Kent	Chatham, Town of	\$141,966.95
Kent	Harwich, Township of	900.00
Parry Sound	Ryerson, Township of	585.90
Simcoe	Collingwood, Town of	9,809.66
\$imcoe	Orillia, Township of	825.00
Stormont	Cornwall, City of	40,000.00
Temiskaming	Teck, Township of	5,849.32

\$199,936.83

#### 2. DRAINAGE SECTION

#### (A) PROVINCIAL AID TO DRAINAGE

Grants paid during the fiscal year 1960-61 to organized municipalities:

Grants paid C	during the fiscal year 1700-01		
		No. of	Amount
_	m 1 :	Grants	of
County	Township	Paid	Grants
Brant	Burford	2	\$ 2,522.34
Bruce	Bruce	2	2,086.12
Bruce	Culross	1	827.33
Bruce	Elderslie	1	3,267.80
Carleton	North Gower	1	12.02
Dufferin	East Garafraxa	1	1,174.09
Dufferin	East Luther	5	1,951.79
Dufferin	Melancthon	2	605.10
Dundas	Williamsburg	2	2,228.72
Dundas	Winchester	3	2,881.70
Elgin	Aldborough	11	10,293.82
Elgin	Dunwich	9	9,650.50
Elgin	Dutton (Village)	1	733.97
Elgin	Malahide	2	2,200.16
Elgin	Southwold	9	11,844.18
Essex	Anderdon	3	2,752.27
Essex	Colchester North	4	5,210.73
Essex	Colchester South	7	13,504.02
Essex	Gosfield South	5	3,260.63
Essex	Harrow (Town)	1	270.44
Essex	Maidstone	7	9,761.86
Essex	Malden	5	3,739.59
Essex	Mersea	9	7,509.57
Essex	Pelee	3	14,847.06
Essex	Sandwich East	5	4,108.73
Essex	Sandwich South	8	20,480.41
Essex	Tilbury North	4	4,507.28
Essex	Tilbury West	3	6,541.10
Glengarry	Charlottenburgh	2	3,535.81
Glengarry	Kenyon	1	2,186.48
Glengarry	Lancaster	1	1,680.83
Glengarry	Lochiel	3	6,370.52
Grey	Derby	2	1,326.09
Grey	Normanby	1	4,908.51
Haldimand	Moulton	2	3,042.33

County	Township	No. of Grants Paid	Amount of Grants
Haldimand	Walpole	1	3,643.70
Huron	Colborne	2	4,092.27
Huron	Grey	2	1,081.47
Huron	Hay	4	3,489.95
Huron	McKillop	7	25,327.19
Huron	Morris	1	927.90
Huron	Stanley	1	1,791.77
Huron	Stephen	4	4,553.49
Huron	Tuckersmith	1	729.95
Huron	Usborne	8	9,588.16
Kent	Camden	9	3,543.98
Kent	Chatham	13	10,264.17
Kent	Dover	18	22,350.73
Kent	Harwich	17	10,275.29
Kent	Howard	7	3,619.26
Kent	Orford	9	4,935.27
Kent	Raleigh	15	8,807.89



The Fitzgerald-White drain, Township of London (Middlesex).

		No. of	Amount
		Grants	of
County	Township	Paid	Grants
Kent	Romney	1	973.33
Kent	Tilbury East	5	4,013.45
Kent	Zone	1	528.33
Lambton	Bosanquet	4	2,605.47
Lambton	Brooke	15	19,652.84
Lambton	Dawn	4	2,672.95
Lambton	Enniskillen	9	10,246.24
Lambton	Euphemia	20	12,732.89
Lambton	Moore	9	9,393.68
Lambton	Plympton	10	11,235.80
Lambton	Sarnia	6	6,017.30
Lambton	Sombra	9	7,256.49
Lambton	Warwick	7	7,115.34
Lambton	Wyoming (Village)	1	894.39
Lincoln	Clinton	1	3,950.23
Middlesex	Caradoc	5	9,315.06
Middlesex	Delaware	3	4,093.49
Middlesex	East Williams	1	1,450.00
Middlesex	Ekfrid	13	12,793.05
Middlesex	Lobo	3	9,022.74
Middlesex	London	4	18,782.44
Middlesex	McGillivray	2	4,293.39
Middlesex	Metcalfe	1	587.50
Middlesex	Mosa	5	3,378.70
Middlesex	North Dorchester	7	11,938.66
Middlesex	West Nissouri	2	1,767.10
Norfolk	Charlotteville	3	3,930.91
Norfolk	Houghton	3	1,858.03
Norfolk	Middleton	4	4,695.72
Norfolk	North Walsingham	1	412.52
Norfolk	Townsend	3	6,743.29
Norfolk	Windham	6	11,212.63
Norfolk	Woodhouse	1	287.22
Oxford	Blenheim	1	7,583.32
Oxford	Dereham	1	1,060.64
Oxford	East Nissouri	4	20,123.87
Oxford	East Oxford	4	5,161.98
Oxford	East Zorra	1	837.13
Oxford	North Norwich	1	831.07

		No. of	Amount
		Grants	of
County	Township	Paid	Grants
Oxford	South Norwich	1	658.83
Oxford	West Oxford	1	538.59
Oxford	West Zorra	1	346.34
Perth	Blanshard	2	2,044.60
Perth	Downie	1	699.84
Perth	Ellice	5	3,085.53
Perth	Elma	6	3,605.02
Perth	Hibbert	1	1,540.75
Perth	Logan	3	1,886.65
Perth	Mornington	5	2,481.69
Perth	North Easthope	2	1,195.04
Perth	South Easthope	1	373.95
Perth	Wallace	6	11,057.14
Prescott	Caledonia	2	5,830.84
Prescott	South Plantagenet	1	1,896.43
Russell	Clarence	1	2,195.53
Simcoe	Adjala	1	1,532.70
Simcoe	Essa	2	2,959.45
Simcoe	Sunnidale	2	1,536.77
Simcoe	Tecumseth	2	4,816.25
Stormont	Finch	2	3,002.62
Stormont	Osnabruck	2	3,862.85
Waterloo	Wellesley	2	2,185.26
Welland	Bertie	1	536.03
Welland	Wainfleet	1	860.74
Wellington	Maryborough	1	143.67
Wellington	Minto	6	7,701.67
Wellington	Nichol	1	704.18
Algoma (District)	Macdonald, Meredith &		
	Aberdeen Additional	1	1,424.48
	Total	491	\$599,998.97

## FINANCIAL ASSISTANCE TO TERRITORIAL DISTRICTS

#### Non-Municipal

The Provincial Aid to Drainage Act, 1954, provides for financial assistance up to 80 per cent of the cost of approved drainage works in unorganized Townships in Territorial Districts and Provisional Counties. The remaining 20 per cent of the cost is paid by the owners of the benefiting lands. Financial assistance under the provisions of the Provincial Aid to Drainage Act, 1954, amounted to \$6,001.29 on six drainage projects, as follows:

District	Township	Amount
Algoma	Galbraith	\$ 918.25
Cochrane	Kendall	328.50
Nipissing	Kirkpatrick	827.58
Nipissing	Macpherson	2,529.92
Nipissing	Kirkpatrick	991.84
Nipissing	Macpherson	405.20
		\$6,001.29

#### (B) MUNICIPAL DRAINAGE

#### GRANTS PAID TO ORGANIZED MUNICIPALITIES

Grants totalling \$12,770.48 were paid in aid of Municipal Drainage in the following locations:

County	Township	Amount
Nipissing	East Ferris	\$ 400.28
Renfrew	Alice and Fraser	400.50
Temiskaming	Casey	2,375.00
York	North Gwillimbury	9,592.70

\$12,770.48

#### 3. ROADS SECTION

#### Summary:

New construction, repair and improvement work on roads, parking areas, sidewalks, curbs, etc., involved an expenditure of nearly \$352,000.00.



Paving operations at entrance of parking lot, O.A.C. Guelph.

#### DEPARTMENT OF AGRICULTURE

### Guelph, Ontario Agricultural College

A contract was let during September for the construction of pavements, sidewalks, curbs, drainage facilities, etc., in the vicinity of the new Physical Education Building.

#### Ridgetown, Western Ontario Agricultural School

Widening and hard-surfacing was carried out on the main access roads, and two parking lots were constructed. A sidewalk was provided on the north side of the Boys' Residence.

#### DEPARTMENT OF THE ATTORNEY GENERAL

#### Blind River, Ontario Provincial Police

An area of approximately 3,500 square yards was regraded and paved to alleviate dusty conditions and to improve appearance.

#### Schreiber, Ontario Provincial Police

The entrance road at the front of the Detachment Building and Garage were regraded, compacted and hard-surfaced to improve vehicular facilities and reduce dusty conditions.

# Shabaqua, Ontario Provincial Police

An area approximately 900 square yards was regraded, compacted and hard-surfaced to alleviate dust and facilitate snow removal.

# Sioux Narrows, Ontario Provincial Police

The entrance drive and parking area in front of the Detachment Building was regraded, compacted and hard-surfaced to improve appearance and safety.

## Waterdown, Ontario Provincial Police

The main entrance road and parking lot on the west side of the Detachment Building was regraded, compacted and hard-surfaced to improve vehicular facilities.

#### DEPARTMENT OF EDUCATION

#### Brantford, Ontario School for the Blind

A small parking area of approximately 270 yards was hard-surfaced

#### Hamilton, Institute of Technology

The main entrance road was widened five feet to improve vehicular safety. Included also was the grading and hard-surfacing of the parking lot.

# Toronto Teachers' College, 591 Carlaw Avenue at Mortimer

The north staff parking lot was doubled in size and a sidewalk was constructed connecting the new and old buildings.

#### DEPARTMENT OF HEALTH

# Aurora, Ontario Hospital

Hard-surfacing was carried out on a small area on the north side of the Administration Building. New sidewalks and curbs were constructed on the east and west side of the building to improve the grounds.

# Cedar Springs, Ontario Hospital

A contract was let during August for the construction of access roads to provide all season access to the buildings. Included also was the construction of a hard-surfaced coal storage yard and sidewalks leading to the Male and Female Pavilions

#### Cobourg, Ontario Hospital

The main road west of the kitchen and around the power plant was regraded and hard-surfaced.

#### Hamilton, Ontario Hospital - Old Section

Main entrance roads, service entrances and new parking lots were graded and hard-surfaced. This constituted an area of over 26,600 square yards.

#### New Toronto, Ontario Hospital

The roads to and from the outpatients' building were hard-surfaced, and three additional parking lots were constructed to accommodate the increased volume of cars on visiting days.

#### **Toronto Psychiatric Hospital**

The tennis and volley ball courts were graded and paved. A catch basin was installed to ensure dry courts.

## Toronto, Ontario Hospital, 999 Queen Street West

The roads to the west and south of the main building were hardsurfaced and the connecting road to the new laundry was graded and paved.

#### DEPARTMENT OF HIGHWAYS

#### **Downsview**, Administration Building

Concrete sidewalks, stairs and retaining wall and guard rail were designed and constructed for the new building to improve the appearance of the grounds.

#### DEPARTMENT OF PUBLIC WORKS

#### Kemptville, Ontario Government Buildings

The entrance roads, parking lot, concrete curbing and drainage facilities were consturcted to improve vehicular facilities.

#### McFarlane Lake, Ontario Government Buildings

A contract was let for road grading and the supply of granular fill and hard-surfacing around the Department of Public Works building. General improvements were started late in the construction season, with the remaining work to be completed in the Spring of 1961.

# Toronto, Bay and Breadalbane Streets

A parking lot was constructed for 63 cars to take care of the overflow from 72 to 76 Wellesley Street.

#### Toronto, 15 Breadalbane Street

A parking lot was constructed for 83 cars to accommodate the over-flow from 801 Bay Street.

#### Toronto, 8 York Street

The staff parking lot on the south side of No. 8 York Street was hard-surfaced. This alleviated the dusty and muddy conditions.

## Toronto, Parliament Buildings, East Block 13-15 Queen's Park Crescent

This parking lot was reconstructed for 72 cars to replace the previously inadequate facilities. In addition, more outside parking was provided for the Department of Highways garage on Surrey Place.

New sidewalks and curbs were constructed and existing sidewalks and curbs reconstructed around the East Block and the nearby Psychiatric Hospital. The work requested by this Department was carried out by City of Toronto forces.

#### DEPARTMENT OF TRANSPORT

#### Downsview, Drivers' Examination Centre

The access road parelleling Falstaff Avenue from Keele Street to the new Drivers' Examination Centre was excavated, regraded and hard-surfaced. This work was necessary to improve the safety of novice drivers.

#### DEPARTMENT OF TRAVEL AND PUBLICITY

# Ivy Lea, Tourist Reception Centre

The main entrance road and parking lot was hard-surfaced and widened to accommodate the increased volume of traffic.

# Kenora, Tourist Reception Centre

The front entrance along Highway No. 17 and parking lots on the east and west side, were regraded and hard-surfaced to improve vehicular facilities.

#### **ONTARIO WATER RESOURCES COMMISSION**

#### Laboratories and Research Building

An overflow parking lot to the south of the laboratory to accommodate 200 cars for conferences was constructed.

#### 4. LANDSCAPING SECTION

#### DEPARTMENT OF THE ATTORNEY GENERAL

#### Blind River, Ontario Provincial Police

A landscape contract was carried out including grading, terracing, sodding and seeding.

#### Ottawa, Ontario Provincial Police

The front of the Administration Building was regraded, terraced, new sidewalks installed, and sodded.

#### Waterdown, Ontario Provincial Police

A landscape contract was completed including grading, terracing and sodding around the Administration Building.

# Sudbury, Court House

The grounds fronting the new Court House were graded, terraced and sodded, including rip-rapping the bank adjacent to the jail with concrete slabs.

#### DEPARTMENT OF HEALTH

#### **Brockville**, Ontario Hospital

The landscaping around the various wings was prepared for seeding and sodding.

#### **5miths Falls, Ontario Hospital School**

The steep banks in front of the Administration Building and nurses' residence were graded and sodded, and the lawns raised and re-sodded.

# Whitby, Ontario Hospital

The grounds adjacent to the new Executive Office Building were raded, drained and sodded at the above site.

#### DEPARTMENT OF PUBLIC WORKS

#### McFarlane Lake, Regional Headquarters Buildings

The lawns and entrance road in front of the new Regional Headquarters Buildings at McFarlane Lake were graded, sodded and seeded.

#### DEPARTMENT OF REFORM INSTITUTIONS

#### Burwash, Industrial Farm

The grounds in front of, and around, the new Camp 5 building at the above site were graded, terraced and sodded.

Respectfully submitted,

W. Z. Rice

W. L. Rice.

Chief of the Civil Engineering Division.

# REPORT OF THE CHIEF OF THE SANITARY ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31st, 1961.

Mr. J. D. Millar, Deputy Minister, Department of Public Works.

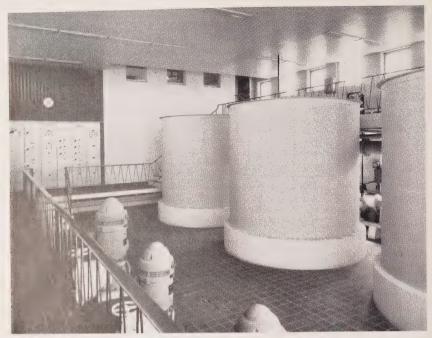
Throughout the year, all of the existing sanitary installations, which consist of waterworks systems, sanitary and storm sewers, sewage treatment plants, pumping stations, etc., at the various schools, hospitals and other institutions in the province, were maintained in good operating condition.

The water supply and treatment plant combined with the sewage disposal plant with outfall sewer was started at the Ontario Hospital, Cedar Springs, in August 1959 and was completed and put into operation during



Aerial view of the sewage disposal plant, Ontario Hospital School for Retarded Children, Cedar Springs.

the summer of 1960. These works were designed to serve a maximum of 5,000 people. The waterworks portion includes an intake out into Lake Erie, a low lift pump house on the shore with a wet well below, a discharge main up to the water treatment plant about 80 feet above the lake level:



Filter tanks at Water Plant, Ontario Hospital Training School for Retarded Children, Cedar Springs.

a booster pumping station adjacent delivers the water to the system of mains. The complete treatment sewage disposal plant is constructed on the high bank above the lake and the final effluent is discharged out into the lake in an outfall sewer.

At the Ontario Hospital, 999 Queen St. W., Toronto, the last remaining section of the 24-inch diameter combined trunk sewer was reconstructed to a City of Toronto manhole on Shaw St. This completes the reconstruction of the entire combined trunk sewer which was in a very deteriorated condition, having originally been constructed about 110 years ago.

At the Ontario Hospital, Kingston, Mowat Division, a new six-inch cast iron looped watermain with an adequate number of fire hydrants was installed to replace the old and inadequate water distribution system in this area. A new six-inch water service, fed by the city main on Copperfield Dr.. was installed and connected to the new looped main which was interconnected to the existing six-inch Newcourt watermain.

At the Ontario Agricultural College, Guelph, in the power house area extensive revisions and additions to the water distribution system were

carried out to provide for the installation of a water softener plant which will, when completed, soften all the water supply to the Ontario Agricultural College and the Ontario Veterinary College. A section of old deteriorated six-inch cast iron watermain, 400 feet in length, was also replaced at the Ontario Agricultural College.

Some sections of old and faulty sewers were replaced in the maintenance construction programme at the following Ontario Hospitals: Smiths Falls, Whitby, New Toronto and also at the Ontario School for the Deaf at Belleville. A comminutor was installed ahead of the sewage treatment plant at the Ontario Hospital, Penetanguishene. This unit grinds up small foreign materials in the sewage. A major repair job was completed on the elevated steel water tank at the Ontario Hospital, St. Thomas. Minor repair work was also completed on the elevated steel water tank at the Ontario Hospital, London. Two other elevated steel water tanks were cleaned and painted. The elevated steel water tank at Ontario Hospital, Kingston, was removed and demolished. This tank was no longer required as the Ontario Hospital supply from Lake Ontario was abandoned and water supply from the City of Kingston arranged for and provided under an agreement. The sanitary sewage disposal system was reconstructed and rehabilitated at the following Ontario Provincial Police detachments: Central Patricia, Minaki, Foleyet, a residence at Cayuga; also at the Reception Centre, Department of Travel and Publicity, at Lancaster; Gale Farm, Ontario Veterinary College, Guelph, and the Fish Hatchery at Glenora.

During the past year many new buildings were constructed at the larger Ontario Hospitals and at several other institutions in addition to new Provincial Police detachments and new buildings such as the Agricultural Services building, Brighton; Fruit Inspection building, Bradford; Department of Travel and Publicity Reception Centre, Barrie, etc. In each case services were provided to suit the respective requirements.

Designs were made, working drawings completed and specifications prepared for the following works contracts which are to be carried out during the new fiscal year:

#### ONTARIO HOSPITAL, GODERICH

The Town of Goderich will supply water to this new hospital via a supply main to be laid south along Highway 21, a distance of about three-and-a-quarter miles. This main will supply an elevated steel water tank of 250,000 Imperial gallon capacity which, in turn, will supply the hospital through a system of mains on which fire hydrants are to be located. A gasoline engine driven fire pump will be employed to boost the pressure to meet fire fighting regulations. A system of gravity sanitary sewers will

be installed to transport all of the hospital sanitary wastes to a sewage lift station which will pump the sewage into a sewage lagoon. Any overflow from this lagoon will be chlorinated and disposed of by gravity to the lake through the storm water outfall sewer. The project includes a system of gravity storm sewers to pick up all drainage and roof water and disposal is to be by means of the above mentioned gravity outfall sewer to Lake Huron.

## ONTARIO HOSPITAL, GRAVENHURST

The complete rehabilitation of the waterworks booster pumping station. The existing piping is old and in a very deteriorated condition. All of the piping is to be replaced, the existing gasoline driven fire pump and one existing electric driven service pump having a capacity of 360 U.S. gallons per minute will be retained; one new electric service pump having a capacity of 200 Imperial gallons per minute has been purchased and will be installed.

Tenders will be called in the near future for the removal and replacement of the existing elevated steel water tank, including a new standpipe. The new tank is to be built on the existing steel tower supporting structure which is in satisfactory condition and will only require to be repainted and braced. This contract will also include the reconstruction of the concrete valve chamber below the tank which will be equipped with an altitude valve, a heat exchanger, also water level controls incorporated to automatically operate the domestic service pumps. In addition to the above, it will be required to provide and install a new steam pressure and return line about 150 feet in length to adequately heat the new water tank during the winter months.

# ONTARIO HOSPITAL, ORILLIA

Tenders are to be called in the early summer for the construction of a new pavilion for retarded children, a laundry building and trades building. Tenders have already been called for the necessary reconstruction and installation of storm and sanitary sewers; also watermains, since the existing services conflict with the proposed building locations. Also included in this contract is the installation of a second eight-inch cast iron watermain from the waterworks pumphouse across Highway No. 11 to the existing hospital water distribution system. This will eliminate any possibility of an interruption in the water supply in the event of a break in either the original or the new main and will provide adequate supply to the new buildings.

#### ONTARIO HOSPITAL, OWEN SOUND

The City of Owen Sound will supply water for domestic and fire requirements to the hospital via two eight-inch cast iron supply mains — one extended out Eighth St. E., the other extended out 10th St. E. These supply mains will feed the hospital through a system of watermains in the hospital property on which will be located an adequate number of fire hydrants. A system of gravity sewers will collect and transport all the hospital sanitary wastes to a sewage pumping station located at the west end of the hospital property. From this point it will be pumped to the head end of the city sewerage system on Eighth St. E., received and treated by the city under an agreement in the new treatment plant which should be completed in a year's time. The storm water run-off and drainage is to be by means of a system of gravity sewers which will discharge into the ditch on the extension of Eighth St. E. thence into a creek.

# GIRLS' TRAINING SCHOOL and ONTARIO GOVERNMENT BUILDINGS, LINDSAY

Tenders were called in the late winter and a contract awarded for the installation of a trunk sanitary sewer commencing from a point on Highway No. 7B immediately in front of the Ontario Government Building, thence westerly along the highway and turning north just east of the Girls' Training School and continuing on through the recently annexed Township of Ops to the town sewage treatment plant. This sanitary sewer will serve the Ontario Government Building, the Girls' Training School and the future growth of the town in this area. The contract for the construction was let by the Town of Lindsay; however, the works are being carried out as per an agreement between the Town and the Department of Public Works, both parties contributing according to the agreement. This sewer, when completed, will enable this department to eliminate the present Ontario Government Building package sewage treatment plant, which will be used at another location. It will also eliminate the installation of a second treatment plant to serve the Girls' Training School now under construction. Storm drainage water from the Girls' Training School will be discharged into the north leg of the Highway No. 7B road ditch. The water supply main to serve the school was installed a year ago.

#### INDUSTRIAL FARM, MONTEITH

Tenders are being called for the construction of a new modern rated aeration type of sewage treatment plant having a capacity of 50,000 Imperial gallons per day. The existing facilities are obsolete and heavily overtaxed.

The effluent of the new plant will be chlorinated and discharged into the adjacent river. The work will involve some changes and alterations in the system of existing sewers in order to bring it to the location of the new plant. Also included in the tender call is the provision of new waterworks chlorination equipment and an automatic control system on the elevated water tank together with enlargements and extensions to the water distribution system to provide adequate water for both domestic and fire requirements.

#### BOYS' TRAINING SCHOOL, SIMCOE

Under an agreement between the Town of Simcoe and the Department of Public Works, the town will supply water to the school and will also receive and treat the school sanitary wastes in their existing sewage treatment plant. To accomplish this, the town will extend their watermain on Victoria St. eastward from the present town limits to Roxborough Corners, thence southerly along the side road to the school. They will also extend their existing gravity sanitary sewer along Victoria St. from the town limits to Roxborough Corners. A sewage pumping station will be provided in the north-east corner of the school property together with a cast iron force main northerly along the side road to Roxborough Corners discharging into the manhole at the head end of the extended gravity sanitary sewer.

The construction of the outside services within the school property will be included in the general contract for the buildings and will include:

- (i) A system of gravity sanitary sewers discharging into the above mentioned sewage pumping station.
- (ii) A system of gravity storm sewers which will discharge into the road ditch of the adjacent east west concession road south of the school. This road ditch discharges into the Lynn River.
- (iii) The water distribution system of mains, with hydrants and an elevated steel water tank with a booster pump and automatic controls. These have been designed to be adequate for the required domestic supply, also fire protection.

# ONTARIO FIRE COLLEGE, GRAVENHURST

The present source of water supply is from springs which have been found to be unsatisfactory. It was therefore decided to abandon the use of the springs as a water source and to use the water from adjacent Lake Muskoka by means of an intake which has been designed.

# ONTARIO PROVINCIAL POLICE HEADQUARTERS BUILDING, BELLEVILLE

The outside services were designed and included in the general contract. Water will be obtained for domestic and fire purposes from the adjacent City of Belleville watermain. Sewage disposal will be by means of a steel prefabricated package type sewage treatment plant with chlorinated effluent. This effluent will be disposed of along with the storm water, in a storm sewer discharging into a nearby creek.

#### HORTICULTURAL EXPERIMENT STATION, VINELAND

To provide facilities for the irrigation of an additional 60 acres, an extension to the existing system has been planned. The extension will consist of almost half a mile of cast iron pipe including five concrete valve chambers which will act as outlets, connections being made by aluminum pipe with spray nozzles.

#### ONTARIO SCHOOL FOR THE DEAF, MILTON

This proposed school property is located adjacent to the Town of Milton boundary. An eight-inch town watermain is located across Ontario St. on the west side and will provide water supply for the school in adequate volume. Also conveniently located across from the school is a trunk sanitary sewer leading to the recently constructed Town of Milton sewage treatment plant. All sanitary wastes from the school will be received and treated in the plant. A system of gravity storm sewers discharging into a large ditch on Highway No. 25, which empties into an adjacent creek, will provide excellent drainage for the school. The installation of the above outside services will be included in the general contract for the buildings.

# DISTRICT GARAGE AND HEATED STORAGE BUILDINGS, DEPARTMENT OF HIGHWAYS, SAULT STE. MARIE

Township of Tarentorus watermains and gravity sanitary sewers are immediately adjacent to this site. In our design these have been used to provide their respective service for the proposed buildings and connections to same will be included in the tender call for the buildings. Storm water will be discharged into adjacent highway ditch.

#### SOUTHERN RESEARCH STATION, MAPLE

Due to continued growth of this station over the past few years and the increasing demand for water for research the original waterworks system has become inadequate. As a result, a new deep well of large capacity was brought into production last year and during the past winter a complete new waterworks system using the production of this new well was designed and working drawings completed so that tenders may be called this spring. The new waterworks, when completed, will provide an ample supply for all domestic, fire and research requirements, and for future planned expansion. The design provides a new system of cast iron watermains with necessary fire hydrants and isolating valves, an elevated steel water tank, an underground concrete water reservoir with water treatment plant for iron removal and booster pumping station. The water supply will be from three deep wells.

#### CONSTRUCTION PROJECTS COMPLETED DURING THE YEAR:

#### ONTARIO HOSPITAL, HAMILTON (Seniles Group)

Additional watermains were provided and looped with existing mains including the installation of six new fire hydrants, to assure optimum fire protection for these new buildings.

#### ONTARIO HOSPITAL, LONDON

The construction of a new 21-inch diameter trunk sanitary sewer discharging into the City of London Dundas St. sewer was completed. This sewer replaces the inadequate and very old sewer which passed under the Department of National Defence buildings.

#### ONTARIO HOSPITAL, THISTLETOWN

The installation of an eight-inch sanitary sewer 2,800 feet in length, which picks up the wastes ahead of the old treatment plant and discharges into the township pumping station, has been completed. This has enabled the department to eliminate the old sewage disposal plant the effluent from which was discharged into the Humber River.

#### INDUSTRIAL FARM, BURTCH

A new activated sludge, mechanical aeration package type of sewage treatment plant, providing chlorination of the effluent, has been constructed and placed in operation. This plant was designed to serve 300 persons and has a capacity to treat 53,500 Imperial gallons of sanitary wastes per day, which includes the laundry wastes. This new unit replaced the old sewage disposal works which consisted of septic tanks and a trickling filter, which did not provide a satisfactory effluent.

#### INDUSTRIAL FARM, BURWASH — MAIN CAMP AND VILLAGE

The sanitary sewerage system has been completely rehabilitated. The works which have been completed and placed in operation include an activated sludge, simplex sewage treatment plant, providing complete treatment and designed to serve 1,500 persons, and with certain additions, ultimately 2,000 persons. Two sewage pumping stations with cast iron



A sewage treatment plant under construction, Industrial Farm, Burwash.

force mains; also the construction of a number of sections of gravity sewers and a water distribution system extension to provide water at the plant, are included. Formerly the main camp and village were served by two sewage disposal plants which were old, obsolete and heavily overtaxed in capacity.

#### ONTARIO REFORMATORY, GUELPH

A cannery wastes disposal has been provided to dispose of all these wastes in an approved manner. This system will dispose of 110,000 Imperial gallons per day. Initially, all wastes are screened, which removes all vegetable solids. These solids are disposed of by burial. The remaining liquid effluent or water is disposed of on cultivated land requiring irrigation, thus accomplishing a dual purpose.

#### DISTRICT JAIL, KENORA

The installation of the outfall sewer from the previously constructed new sewage treatment plant out into the adjacent Lake of the Woods was completed. A gravity sewer from the governor's residence to the treatment plant has also been constructed. This residence was formerly served by a septic tank which was unsatisfactory.

#### FRUIT INSPECTION BUILDING, FRUITLAND

A six-inch cast iron water supply main was laid from a recently installed extension of the Township of Saltfleet system, about 600 feet easterly along the Queen Elizabeth Highway, to provide both domestic supply and fire protection to this building.

# ONTARIO AGRICULTURAL COLLEGE AND ONTARIO VETERINARY COLLEGE, GUELPH

The construction of the second half of the eight-inch cast iron water-main loop around both colleges has been completed. The necessary number of interconnections to existing mains were made, additional fire hydrants installed and two new services provided to the new Medical Surgical building of the Veterinary College; these services were interconnected inside the building so that there could be no possibility of interruption to the water service in case of a break in an outside main.

# EXPERIMENTAL FARM, NEW LISKEARD

The installation of an eight-inch sanitary gravity sewer to carry the sanitary wastes from the new Agricultural Services building into the town sewage system was completed. Water supply and fire protection are provided by a six-inch watermain previously constructed and connected into the town water system.

# SCHOOL OF MINES, HAILEYBURY

A system of gravity storm water drains to dispose of roof water and storm water run-off was constructed to discharge into the open ditch on Latchford St.

#### ONTARIO ATHLETIC LEADERSHIP CAMP, LONGFORD MILLS

Last September, a contract was awarded and construction was commenced on the outside services to provide for the relocated building site for this camp. This work includes revamping the whole waterworks system, the installation of a system of sanitary sewers and the provision of a new sewage treatment package type plant with chlorinated effluent together with an outfall sewer into adjacent Lake Simcoe. This contract has not yet been completed but the works will be completed and put into operation during the latter part of May, 1961.

#### TEACHERS' COLLEGE, PORT ARTHUR

Water supply for both domestic use and fire requirements has been provided by carrying out an extension to the City of Port Arthur water main on Oliver Rd. Port Arthur will receive and treat in its sewerage system, the wastes from this college. In order to deliver the sanitary sewage to the head end of the city sewers on Oliver Rd. at Lyon Ave., a sewage coumping station and a 1,200-foot long force main were constructed.

#### ONTARIO PROVINCIAL POLICE DETACHMENT, OAKVILLE

The detachment and seven residences formerly served by individual septic tanks, have been transferred by the construction of individual house drain connections to a recently constructed Township of Trafalgar trunk sanitary sewer.

During the year at various locations throughout the province, 31 deep wells were drilled, developed and brought into production. All of hese wells were of small and medium capacity, i.e. with a production of from three to 15 Imperial gallons per minute. In each of these wells, except n locations where the building to be supplied was not constructed, a suitable automatic domestic pressure system was supplied and installed.

A complete site survey was carried out from which a site plan was repared showing all buildings, roads, walks, fences, etc., and all underround services, at the following locations:

Ontario Reformatory, Guelph.
Ontario Veterinary College, Guelph.

A re-survey was made at the Ontario Veterinary College, Gale Farm (Research Unit), following which the site plan was revised and brought up to date.

A preliminary survey and pre-engineering investigation was carried out at the Psychiatric Institute, Byron, and the pertinent facts and information obtained necessary to plan the revisions and additions required to rehabilitate the outside services.

Respectfully submitted,

H. E. Bushlen, P. Eng.,

Chief of the Sanitary Engineering Division.

HEBushlew.

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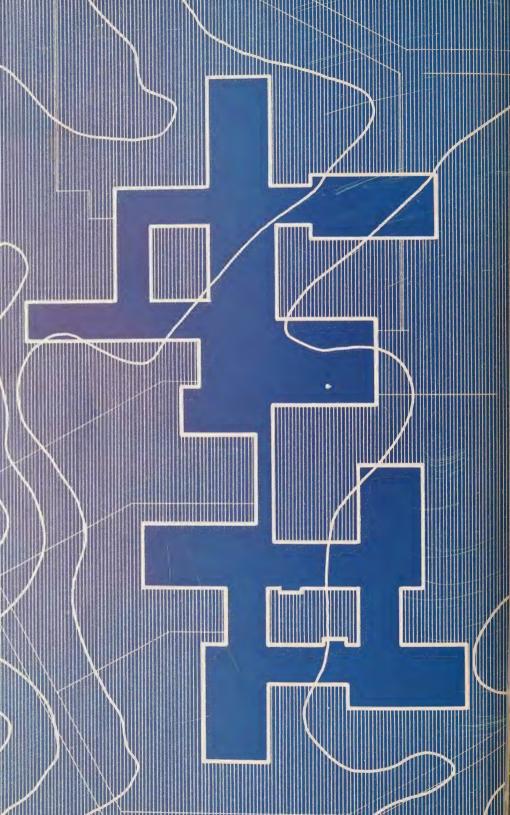
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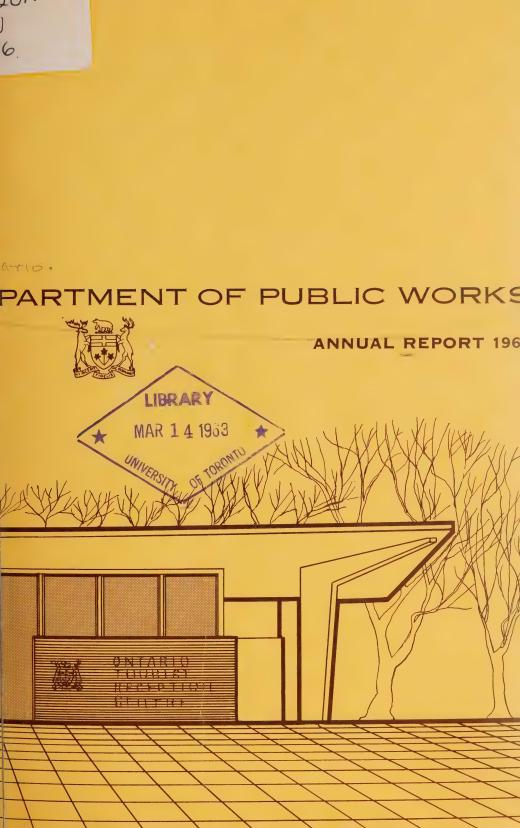




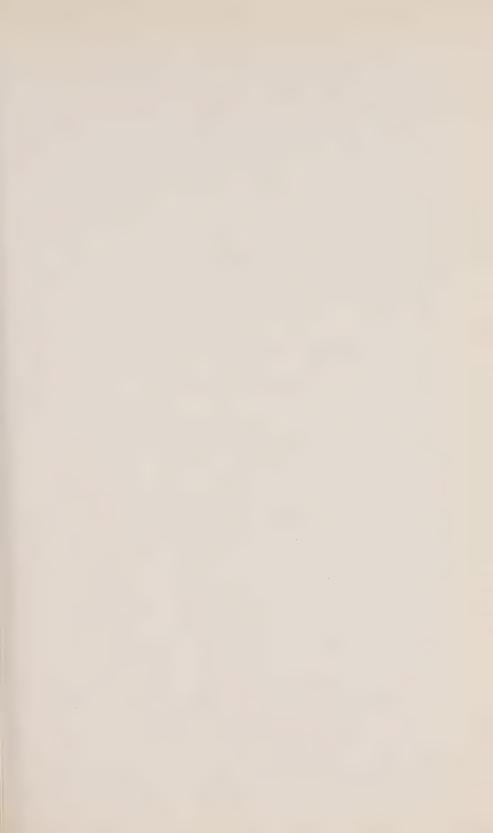














# REPORT

of the

# Minister of Public Works

PROVINCE OF ONTARIO

FOR THE YEAR ENDING MARCH 31, 1962

PRINTED BY ORDER OF THE

LEGISLATIVE ASSEMBLY OF ONTARIO

SESSIONAL No. 14 — 1962



PRINTED AND PUBLISHED BY FRANK FOGG, PRINTER TO THE QUEEN'S MOST EXCELLENT MAJESTY

TORONTO

CANADA



THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE J. KEILLER MACKAY, Lieutenant-Governor of the Province of Ontario.

#### MAY IT PLEASE YOUR HONOUR:

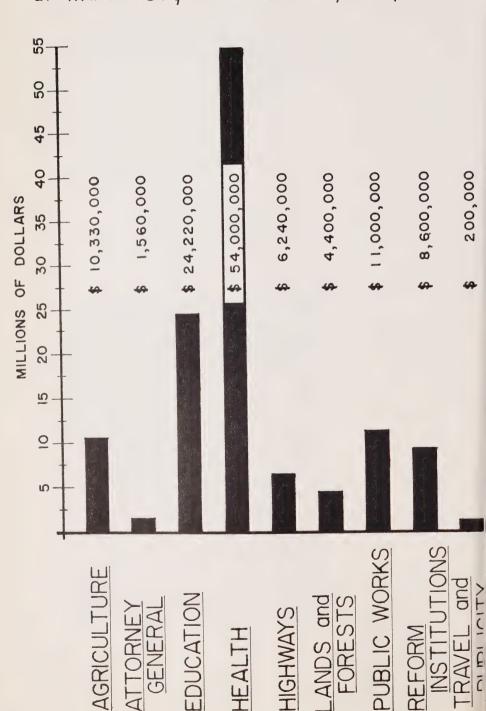
As required by law, I submit for the information of Your Honour and the Legislative Assembly, the Annual Report of the works under control of the Public Works Department, comprising the report of the Deputy Minister, for the twelve months ending the 31st of March, 1962.

Respectfully submitted,

MINISTER OF PUBLIC WORKS

Department of Public Works, Ontario Toronto, March 31, 1962.

# ONTARIO DEPARTMENT OF PUBLIC WORKS Estimated Total Value of Work Underway at March 31, 1962 (\$120,550,000)



THE HONOURABLE RAY CONNELL, Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Sir:

I have the honour to submit to you my General Summary together with the reports of the Chiefs of the Architects' Branch, the Property Branch, the Accounts Branch, the Civil Engineering Division and the Sanitary Engineering Division, for the fiscal year, April 1, 1961, to March 31, 1962.

In presenting this Report, I desire to take the opportunity to again extend my sincere thanks and appreciation to you for your very patient and kindly attitude when dealing with all matters pertaining to the administration of this Department, and also to thank the members of the Department of Public Works for their co-operation and assistance in carrying out a large construction program.

I have the honour to be, Sir,

Your obedient servant,

J. D. Willer Deputy Minister of Public Works.

Toronto, March 31, 1962.

#### SUMMARY BY THE DEPUTY MINISTER

The past year has been a busy one for the Department of Public Works, with increased emphasis being placed on the advanced planning of our work. While the most significant of these plans must be the proposed Queen's Park office extension program, a host of smaller jobs were pre-planned for tender call during the forthcoming fiscal year.

The Queen's Park plan, prepared for presentation to the Legislature at the current session involves the construction of four inter-related office blocks in the area bounded by Surrey Place, Bay, Wellesley and Grosvenor



Architect's model of the proposed complex of buildings for Queen's Park showing the northern aspect.

Streets. The principles on which the plan is based include the bringing together of all Metropolitan Toronto government offices with which the public has frequent dealings and, at the same time, enhancing the old Parliament Buildings in their legislative function by removing many of the business offices.

Efficiency, of course, must be the keynote of any modern office development. The Chief Architect's Branch considered a number of design schemes, always keeping in mind that the old Parliament Building will remain as the heart of Ontario Government and that any new building program must not physically overwhelm the old buildings in appearance. The final proposal of the departmental architects is a complex of four office tower blocks tied together by a low central core building which will house many facilities common to future occupants of all blocks. All services would be underground and there would be two levels of underground parking including a large area for public parking.

It is planned that leading associate architects and consulting engineers will be commissioned to guide the department at all stages of construction and that working drawings will be completed for tender call in early 1964.



Architect's model of proposed Queen's Park expansion plan in view from College St.

### REPORT OF THE CHIEF OF THE ARCHITECTS' BRANCH

MR. J. D. MILLAR, Deputy Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Dear Sir:

I have the honour to report on the work done by the Architects' Branch of the Department of Public Works, Ontario, during the fiscal year April 1, 1961, to March 31, 1962.

During the fiscal year a considerable program of construction of new buildings was again undertaken by the Department of Public Works to meet the requirements of the various branches of the Government services.

Some \$120,550,000 worth of construction was in planning or construction during this period. Priority was given to the needs of the Health and Educational Departments and an extensive schedule of work was engaged in relative to the erection of new mental hospitals, a nursing school, teachers' colleges, a new Ontario School for the Deaf, and a new unit for Toronto's Ryerson Institute of Technology. Emphasis was also given to the establishment and expansion of technical training facilities to upgrade the skills of adult workers and the provision of further educational opportunities for graduates of secondary school vocational education courses.

For Reform Institutions, two new training schools, a new school building and new dormitory accommodation are well advanced. A large amount of work was also carried forward in the way of new building for the Department of Highways, additions to existing building general maintenance and considerable fireproofing work. Major project appear in the report below, listed by departments.

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

Alterations, renovations and redecoration were advanced during the year for the accommodation of various branches of the departments in the Parliament Buildings.

In the Main Building, two new passenger elevators were installed in the west wing. Woodwork was cleaned and refinished on the third and fourth floors and work on stairwells completed.

In the East Block, the issuing office of the Department of Transport underwent extensive office renovation which included the removal of walls, erection of partitions, rubber tile flooring, acoustic ceiling, new counters and lighting. An air tube system was installed for conveying messages to the various offices of the issuing section. Alterations were made on the 15th floor involving removal and erection of partitions for the Surveys Division of Public Works. A locker and shower room was set up in the basement for use of heating plant engineers and maintenance staff. Change and lunchrooms were set up in B-530-2-4 and 6 for the cleaning staffs. Skylights over the boiler room were removed and the openings covered with wood decking and a built-up roof applied.

The newly acquired property at 801 Bay Street located at the north-easterly corner of Bay and College Street, which has been undergoing extensive interior changes for the accommodation of various branches of government, was substantially completed. This building has a frontage of about 112 feet on College Street and about 105 feet on Bay Street and comprises a basement, 12 floors and penthouse. It is serviced by three passenger elevators.

A Government-owned building at 875 Bay Street, Toronto, after being vacated by commercial tenants, was renovated to house departments of Government. The structure is of solid brick construction with the ground floor on grade in poured concrete. A small section at the rear is excavated to house the boiler room. It is three storeys, 125 feet by 32 feet, with two upper floors of wood joist construction. The first floor is occupied by the Security Transfer Tax Division of the Treasury Department. The second and third floors are occupied by the Medical Statistics Branch of the Department of Health. Partition changes, new tile flooring and a complete new lighting distribution system were installed to suit the necessary departmental requirements.

At Osgoode Hall, the progressive renovation program was advanced and a number of works projects were completed. This included work on the Masters' Courtroom which consisted of repairing and refinishing all woodwork to a new colour scheme, repair and upholstering of all chairs, bench seats, back rests, desk tops, etc., installation of new carpeting throughout, complete redecoration of the courtroom and installation of new cathedral type windows, steamfitting and electrical changes. Renovation of the glass dome in the main hall was finished. A new steel fire escape was erected from third floor offices by the judges' courtyard.

Routine maintenance, redecoration and renovation work was carried out at the following locations occupied by government personnel in Metropolitan Toronto: 8 York Street, 434 and 454 University Avenue, 291-295 Sherbourne Street, 204 Richmond Street West, 160-168 Richmond Street, Queen's Quay, Queen and York Streets, 125-127 Lakeshore Boulevard East, 70 Lombard Street, 1075 Millwood Road, 20 Surrey Place, 7 Queen's Park Crescent and the Treasury Building.



View of demolition under way at St. Joseph's Convent, Toronto, with the tower of the East Block in the background.

During the year offices and buildings occupied by government personnel on a leased basis were improved or renovated. This involved extensive partitioning, electrical changes, furnishings, etc. Such work was carried out at 795, 800, 859, 863, 897 and 1118 Bay Street, 156 Bloor Street East, 42-48 Charles Street, 278 Davenport Road, 40 Eglinton Avenue East, 559 Jarvis Street, 20 Spadina Road and 500 University Avenue, Toronto.

Demolition work prior to future construction on the St. Joseph's Convent site was about 75 per cent completed at this time. The Athelma Apartments at the corner of Surrey Place and Grosvenor Street were vacated and demolition is in progress. Twelve properties on Breadalbane Street, Numbers 55 to 77 were acquired and tenders were out for demolition. The buildings at 45 and 47 Grosvenor Street were demolished.

The buildings at 206-212 Huron Street, which formerly housed the Fire Marshal's office and the Department of Education have been demolished in preparation for construction of a new Psychiatric Hospital.

The buildings at 24, 26 and 28 Holly Street, formerly occupied by the Crippled Children's Section of Child Welfare, were vacated and tenders for demolition are out.

#### DEPARTMENT OF PUBLIC WORKS REGIONAL BUILDINGS

At Sudbury (McFarlane Lake) a new fence, entrance gate and illuminated sign were erected; the sanitary sewer, watermain and storm sewer project was finished and work at the new Regional Office and



The new illuminated entrance and fence at McFarlane Lake, Sudbury.

Stores Building was completed. A cement block workshop building was erected at Huntsville and minor repairs and renovation was done at Mimico, North Bay and Port Arthur.

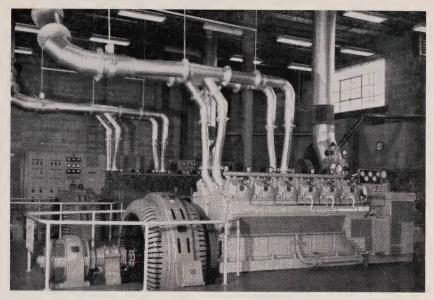
### ONTARIO GOVERNMENT BRANCH OFFICE BUILDINGS

The three-storey Government Office Building in Sault Ste. Marie, housing several Government Departments and a store of the Ontario Liquor Control Board, was accepted as being substantially complete on October 4, 1961. Construction of this "L"-shaped building began on August 20, 1960. It was officially opened on November 4, 1961, by the Honourable Ray Connell, Minister of Public Works, and Mr. G. Harry Lyons, M.P.P. for Sault. Ste. Marie. Associate architects were Rounthwaite & Fairfield of Toronto. The general trades contract of \$689,789 was awarded to Newman Brothers Ltd. of St. Catharines for this project.

Renovation and redecoration of the Government Offices at Kingston and London was completed during the year and boiler room repairs were made at Red Lake.

# For The DEPARTMENT OF AGRICULTURE

During the year major work was brought to completion at the Ontario Agricultural College, Guelph. Official opening ceremonies were held on June 17, 1961, to commemorate the completion of the new Biolog Building, the second to be built in the Science Buildings group. Hon. Ra Connell, Minister of Public Works, and the Hon. William A. Goodfellow Minister of Agriculture, jointly unveiled the plaque on this occasion The building is about 200 feet by 135 feet and consists of a basement ground, first and second floors. It is of brick and masonry construction and fire-resistant throughout. W. R. Souter, Associates, of Hamilton were associate architects on this job which was contracted to Dunke Construction Co. of Kitchener for \$1,009,588. The new Piggery and Box Pen, started on November 18, 1960, was turned over to the Husbandr Department in September 1961. This \$90,870 contract was awarded t A. Battaglia Construction Company Ltd., Guelph contracting firm an completed in all its phases by January 1962. The Main Generating an Switch-gear Building, under construction since October 1958, was con pleted and turned over to the College in March 1962. This 88 by 67-for building is located on a site north-west of the boiler house and service both the O.A.C. and O.V.C. The Water Softener Building addition the power plant, begun July 15, 1960, was put into operation in Octob



Diesel plant at the Ontario Agricultural College, Guelph.

1961 and is working to specifications. Work on this project is continuing. Construction of the Horticultural Storage Laboratory, formerly known as the Refrigeration Storage Building, is in its final stages. General contractor on this project was Ball Bros. Limited, of Kitchener, who were awarded a \$90,870 contract. This 220-foot by 50-foot building is basically designed for research work in connection with the storage of fruits and vegetables, especially controlled atmospheric storage for apples. The renovation program at the College was extensive and included complete renovation of the Old Biology Building and MacDonald Hall which is continuing; the provision of a new laboratory at Trent Institute; conversion of classrooms into a laboratory at the Apiculture Building; installation of outside electrical services at the Arkell Farm; completion of improvements to the growth chambers at the new Soils Building; continuation of the roads improvement program; completion of hydro distribution for the Dominion Entomological Laboratory; continuance of the underground steam project; general rewiring and relighting of the Physics Building and extension of the fire alarm system to MacDonald Institute.

At the end of the year, conversion of the Horse Clinic at the Ontario Veterinary College into laboratories and offices was finished and renovations to the Pathological and Bacteriological laboratories had reached

the finishing up stages. Extension of the fire alarm system was also carried forward.

Farquhar Construction Ltd. of North Bay received a \$198,958 contract for the construction of a new Agricultural Services Building at New Liskeard. The new building was officially opened on August 12, 1961, with the unveiling of a plaque by the Hon. William A. Goodfellow,



The completed Agricultural Services Building, New Liskeard.

Minister of Agriculture, and the Hon. Ray Connell, Minister of Public Works. Complete work on this project was not finished until November 1961. The one-storey building is "L"-shaped, about 158 feet by 37 feet at the main core with the wing section 54 feet by 51 feet six inches. Parking for 30 cars is provided on the east and west sides of the building. The structure serves the agricultural requirements of the Temiskaming area.

At Kemptville Agricultural School, a bronze plaque was unveiled on June 3, 1961, to mark the official opening of the new Home Economics Building. Hon. W. A. Goodfellow, Minister of Agriculture, and Hon. Ray Connell, Minister of Public Works, officiated at the ceremonies. This was a \$259,966 contract awarded to the Angus Robertson Co., Toronto contracting firm. The boys' residence was reroofed and extensive fireproofing done. Ready for tender call was a new power house.

The new Agronomy Building at Western Ontario Agricultural School, Ridgetown, started in June 1960, was brought to completion in late May 1961. The official opening took place on January 16, 1961, with Hon. W. A. Goodfellow, Minister of Agriculture, and Public Works Minister Ray Connell officiating. General construction of this building, including electrical, outside services and sub-station, was finished in May, 1961, with final inspection of incubators made on May 29, 1961. This is a split level, storey-and-one-half structure 199 feet long and 25 feet wide. It accommodates lecture rooms, laboratories, seed storage, seed vaults, seed drying and seed processing rooms, machine storage, growth channels, soils laboratory, cold storage rooms and offices. The 165 by

38-foot beef barn, construction of which started in October 1960 and reported essentially completed in the previous year's Report, was completed in all its phases by June 1961. General maintenance included exterior painting of four farm buildings and installation of lightning rods at the bull testing barn, beef barn and silo.

The Regional Services building at Brighton was opened officially by Hon. W. A. Goodfellow, Minister of Agriculture, and Hon. Ray Connell, Minister of Public Works, on June 10, 1961. At this time the building, which services the agricultural requirements of the Bay of Quinte area, was substantially completed and in use but finishing work was carried forward until the end of the fiscal year in March 1962. General contractors for this \$234,713 job were M. Sullivan & Son Ltd. of Arnprior.

The Fruit Inspection Station at Bradford was finished in June 1961. This new station is a year-round operation.

At Simcoe Horticultural Experimental Sub-Station, a pumphouse was built and a fence erected around the irrigation pond. About 2,348 feet of watermain and valve chambers were installed as extension to the irrigation system at the Horticultural Experimental Station, Vineland, fence was erected to protect sections of orchards and repairs made to the entrance at the Extension Building. Barns at the Sault Ste. Marie Strathclair Farm were painted.

### For The DEPARTMENT OF THE ATTORNEY GENERAL

#### **ONTARIO PROVINCIAL POLICE BUILDINGS**

Long term plans for expansion of facilities for the Attorney General's Department were further augmented with the acquisition of three new Headquarters Buildings for the Ontario Provincial Police at Belleville, Burlington and Cornwall.



The new District Headquarters' Building at Belleville.

The design of all three is similar, consisting of a two-storey-with-basement administration section with single-storey cell block and a single-storey garage section. Construction consists of brick walls, concrete floors and roof slabs. Other buildings of this type were constructed in previous years at Barrie, Niagara Falls and Port Arthur.

The Burlington project, begun in September 1960, was occupied on November 29, 1961. Gordon Adamson & Associates, Toronto, were



Completed District Headquarters' Building at Burlington.

associate architects. Grassie Construction Co. Limited, Port Colborne, received a \$247,140 general contract for this project. Cornwall, started in February 1961, and Belleville in March 1961, were essentially completed in January 1962. H. J. McFarland Construction Co. Limited of Picton received contracts for both these works — \$254,251 for Belleville and \$244,057 for Cornwall.

Police moved into their new detachment building at Dryden on March 22, 1961, but landscaping and paving of the parking areas and driveways were not finished until September with final inspection of the building made on November 28, 1961. General contractors were Stead & Lindstrom Ltd. of Fort William. The contract was for \$172,552.

At Sault Ste. Marie a small radio transmitter station was erected. A transmitter building was substantially completed at Sudbury the previous year but all details on this project were not completed until August 1961.

General maintenance, renovation and alteration, paving and sodding operations and minor construction and installations were carried forward at numerous police centres. These included Armstrong, Atikokan, Beardmore, Bancroft, Belleville (housing), Blind River, Brighton, Britt (Still River), Burk's Falls, Cochrane, Cobourg, Dryden (housing),

Ear Falls, Elk Lake, Emo, Englehart, Espanola (McKerrow), Geraldton, Gogama, Haileybury, Hearst, Hudson, Kapuskasing, Kenora, Killaloe, Kingston, Kirkland Lake, Little Current, London, Matheson, Mattawa, Minaki, Minden, Niagara Falls, Nipigon, North Bay, Pembroke, Picton, Port Arthur, Rainy River, Sault Ste. Marie (housing), Schreiber, Simcoe, Sioux Lookout, Sioux Narrows, South River, Sturgeon Falls, Sudbury, Temagami, Timmins, Woodstock and Whitby.

#### COURTHOUSES AND REGISTRY OFFICES

Two Registry Offices — one at Parry Sound and the other at Kenora — are under construction. A \$142,064 contract was awarded to Konvey Construction Co. Limited of Kingston for the Parry Sound project. The Kenora firm of Bergman & Nelson Co. Limited got the \$120,602 Kenora award.

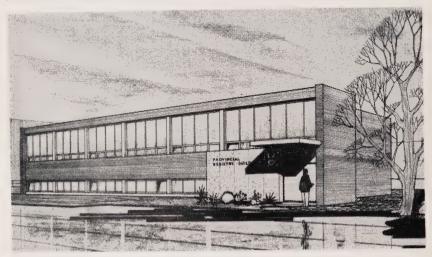


Advanced construction progress of the new Registry Office, Parry Sound.

The new Registry Office at Parry Sound is being built on government property located on Miller Street at the rear of the existing Courthouse and Registry Office. It is a single-storey with basement structure of concrete faced with brick. Dimensions are 60 feet by 82 feet. Floors are reinforced concrete with terrazzo and resilient tile finish. The main floor has a large central office area with individual offices around the

outside. The basement is a dead storage area with restroom facilities. Heating will be derived from the Courthouse boiler room. Construction of the building is about 90 per cent completed.

The contract for the new Registry Office at Kenora was awarded on March 4, 1962. The structure will flank Kenora's main park in which the town memorial stands and will face on Main Street with a rear entrance on Water Street, near the Courthouse. The brick and stone-faced



Perspective of the new Registry Office, Kenora.

building will be about 92 feet by 46 feet and will be single-storey with finished basement. In the basement will be a large record storage area, book binding and binding storage section and a lunchroom. On the main floor will be a large central registry office and photo copy room, ample space for the public, offices for the registrar, deputy registrar and lawyers, as well as storage and washroom facilities. Construction started in the spring and it is expected the building will be closed in and finished next winter. The old Registry Office will be turned over to the town for use as a museum when no longer needed by the Province.

Sudbury District Courthouse and Registry Office, following an extensive program of additions and renovations, was officially opened by the Hon. A. Kelso Roberts, Attorney General, the Hon. Ray Connell, Minister of Public Works, and Mr. Rheal Belisle, M.P.P. for Nickel Belt, on June 4, 1961. The renovation project to the main section of the District Courthouse was completed in October and all work is finished on paving of the driveway and parking area, and landscaping.

Substantial renovation work at Sault Ste. Marie Courthouse was carried forward from the previous year.

Routine maintenance and renovations were carried out at the following Courthouse and Registry Offices: Algoma-Manitoulin (Gore Bay), Cochrane North (Cochrane), Kenora (Kenora), Muskoka (Bracebridge), Nipissing (North Bay), Parry Sound (Parry Sound), Rainy River (Fort Frances), Temiskaming (Haileybury), and Thunder Bay (Port Arthur).

#### FIRE MARSHAL

Routine work was done at the Fire College, Gravenhurst. This included installation of the eight-inch cast iron watermain into the lake; installation of frame supports for life nets; renovation of boiler room piping; connecting sewage services from the administration building and director's residence to the main sewage system as well as work on various other minor installations.

### For The DEPARTMENT OF COMMERCE AND DEVELOPMENT

Minor repairs were made to the buildings at Markham.

### For The DEPARTMENT OF EDUCATION

New building construction for the Department of Education was extensive, including the completion of a new Teachers' College at Port Arthur and the start of another new Teachers' College at Windsor, as well as the undertaking of two projects of considerable magnitude at Toronto and Milton. A Northern Institute of Technology at Kirkland Lake is planned.

The new Teachers' College at Port Arthur was completed in October 1961. Tenders for its construction were called in February 1960 and a \$749,773 contract awarded to the Bird Construction Co. Limited of Port Arthur. The new Teachers' College is the first to be built in that large section of the province west of North Bay. It is situated on high commanding land on Oliver Road at Lyon Avenue, and it is adjacent to, and east of, the new Lakehead College of Arts, Science and Technology. A plaque to commemorate the opening of the college was unveiled on October 18, 1961, by the Hon. John P. Robarts, Minister of Education.



The new Lakehead Teachers' College, Port Arthur.



Section of the library, Lakehead Teachers' College, Port Arthur.



The auditorium of the Lakehead Teachers' College, Port Arthur.

The plaque also marked the laying of the cornerstone by the Hon. Ray Connell, Minister of Public Works, and the Hon. George Wardrope, Minister of Reform Institutions, on August 25, 1960.

A \$990,000 contract was awarded to Ascon Construction Ltd. of Windsor for the construction of a new Teachers' College to be erected on a large site at Bruce Avenue and the Third Concession Road in Sandwich West Township, Windsor, on July 25, 1961. It will be a two-storey "L"-shaped building, of steel frame with brick walls, wood sash and



Winter view showing steel work of the new Teachers' College, Windsor.

metal ventilators. Present plans call for 12 classrooms including industrial arts, home economics, art, science and social studies. Provision for six more classrooms has been made. Administration and staff offices and five classrooms are on the main floor. The balance of this floor is occupied by a 350-seat auditorium with full stage and projection room facilities: a large gymnasium with spectator gallery, dressing rooms and showers and a 160-seat cafeteria with accompanying kitchen facilities. Adjacent to the cafeteria, is a large interior court offering a pleasant view from the dining room. The gymnasium and auditorium rise two storeys. A health centre is also on this floor. The second floor comprises seven classrooms, a large library, students' common room and committee rooms, various offices, storerooms and washrooms. Floors throughout will have resilient tile in the rooms and terrazzo in the corridors. The ceilings are generally acoustic plaster. Convector heating will be used with considerable ventilating equipment. Surface mounted fluorescent fixtures will provide lighting and there will be a paved parking area for about 200 cars. At the end of the fiscal year steelwork was completed, roof decking on, with second floor pans laid, 20 per cent of slab poured and about 40 per cent of exterior brickwork laid.

One of the biggest jobs now in progress is that of the new Ontario School for the Deaf at Milton. Marani, Morris & Allan of Toronto are associate architects. Eventually 450 will be housed in this new residential school — 200 in the Junior School, 200 in the High School and 50 in the



Perspective of the new Ontario School for the Deaf, Milton.

Kindergarten. A \$3,817,000 contract for the first-stage construction comprising the Junior School, Staff Residence, Hospital, Administration, Laundry and Boiler Plant buildings, was awarded to Frid Construction Co. Limited of Hamilton on September 12, 1961. The site is on Highway 25, south of Halton Centennial Manor. Contract work began immediately and good progress has been made. Overall completion of the project at this time is 34 per cent.

The Junior School is a one-storey structure consisting of classrooms, dormitories and dining rooms. The classroom sector is about 359 feet by 100 feet with 25 classrooms, large activities room, rhythm room, projection and clubroom, library, teacher training and teachers' lounge. Classrooms of about 10 children will permit highly individual instruction. Careful control of sound in instructional areas is essential to teaching deaf children. This will be assured by the plan and construction of the buildings. Special precautions have been taken for the safety of these children who do not respond to spoken directions. Vehicular traffic will be restricted within the perimeter of the campus and prohibited in areas where children might be playing. Fire alarms by light signals as well as sound will be provided.

Dining rooms and the kitchen, dishwashing and bakeshop areas will be located in a 129 foot by 35 foot wing section to the classroom area. The basement will be devoted to kitchen and dining rooms, storage, washrooms and mechanical services.

The other section of the Junior School consists of the dormitory area. Dormitory wings will be divided into individual units of 30 children to permit constant supervision and to minimize institutional atmosphere. The units will be separated from each other by landscaped courtyards and linked by covered walks. In each courtyard is a large piece of sculpture, representing Canadian wildlife, upon which the children can climb. There are seven units, each comprising two dormitories of 15 beds, washrooms, bathrooms, showers and self-contained units of bedroom and bath for the House Mothers. Each dormitory will have its own indoor and outdoor play areas, washroom and cloakroom facilities. There is also a unit for trunk rooms, clean and soiled laundry, blanket and janitor's supplies serving all seven dormitories.



View showing construction progress of Dormitory Unit No. 4, taken from the east,
Ontario School for the Deaf, Milton.

The staff residence will be a basement and two-storey structure of steel frame and brick construction, 187 feet by 35 feet at the main core with a 60 by 32-foot wing. The basement will be devoted to trunk storage, games, lounge and mechanical rooms. The first and second floors will each have 20 bedrooms, one bedroom and living room suite, a library, lounge and utility rooms.

The hospital building will be "T"-shaped, 185 feet by 47 feet at the main core with the transverse section 114 feet by 47 feet. It will house six four-bed wards, two wards with two beds, two isolation wards with two beds, two dayrooms, nurses' bedrooms, matron's quarters, house parents' room, various rooms for washing facilities, doctors' offices and examination rooms and dental and eye examination rooms.

The administration section will be contained in a one-storey 150 feet by 47 feet structure accommodating a large general office, conference room, superintendent's office, and offices for secretaries, the bursar, dean, mimeograph machines, restrooms and special hearing room.

The laundry, 116 feet by 52 feet, is also a one-storey building having a small basement with space for sorting, sewing and shipping services and restrooms.

The power plant, also one-storey, will be 83 feet by 80 feet containing boiler and electrical rooms, incinerator, workshop, engineer's office and washrooms. Heating will be by coal. A standby diesel generator will be supplied.

All buildings will be of brick construction — wall bearing in all single-storey buildings and steel frame and brick in all two-storey structures. All electrical services will be underground within the limits of the campus.

Toronto's Ryerson Institute of Technology will present a completely new face to the public when the building program for the school is completed. Work started during the winter of the previous year on the demolition of three old school buildings preparatory to the construction on this site of Unit No. 3 of the new building group, was completed the

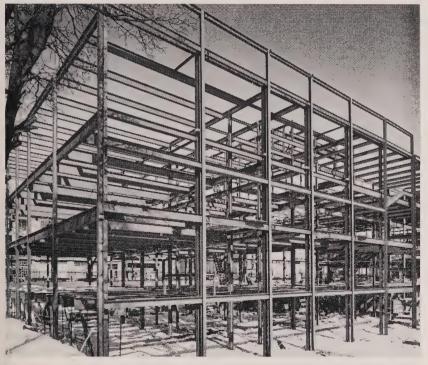


Construction under way at Unit No. 3 of the new building group, Ryerson Institute of Technology, Toronto.

early part of the year. Associate architects on this project are S. B. Coon & Son of Toronto. Construction of the new building group began on August 14, 1961, when a \$5,670,000 general contract was awarded to Perini Construction Ltd. of Toronto. Unit No. 2—the East Wing facing Church Street and running about 175 feet along Gerrard and Gould Streets, was completed in 1959.

The new sections will include the administration wing with library and home economics department, many classrooms, lecture rooms, and laboratories for English, mathematics and social sciences; childhood management and fashions; journalism, advertising, printing and management; photographic arts; business administration and secretarial science; merchandising; hotel, resort and restaurant administration; and highway technology. This wing will also include the physical education department with gymnasium and swimming pool in addition to the cafeteria and auditorium.

The completed Ryerson will cover the whole city block bounded by Gerrard, Church, Gould and Victoria Streets. The buildings will have a frontage of about 530 feet on each of the four streets. There will be gateways into the three main entrances to the campus — one on



Advanced steel work, Unit No. 3, Ryerson Institute of Technology, Toronto.

Gerrard Street and two off Gould Street. These will be two-storey arcaded entrances into the campus — a 360-foot square forming a central court from which all the buildings can be entered. Around this campus

will be a driveway, sidewalk and parking for about 100 cars. The campus will be attractively laid out with walks, lawns, gardens and planting.

At the end of the fiscal year, the project had advanced to these stages: concrete work 55 per cent and concrete fireproofing 25 per cent; structural steel 70 per cent and reinforcing steel 55 per cent; plumbing and electrical 20 per cent and heating 10 per cent.

Emphasis was given to the establishment and expansion of technical training facilities to upgrade the skills of adult workers and provide further educational opportunities for graduates of secondary school vocational education courses.

The former Toronto Hydro Garage at 25 Wellesley Street West, Toronto, was acquired by the Department of Public Works in August 1961 and underwent extensive renovation to serve as a Trades School for the Department of Education. It will be used in conjunction with the Trades School at 15 Breadalbane Street, Toronto. The west half of the building, being the original structure, is about 200 feet by 75 feet, solid masonry brick perimeter, reinforced concrete beams and columns, two storeys, with an existing ramp from street level to the second floor, reinforced concrete floors and roof deck. The easterly half, added in later years, is of solid brick, structural steel columns and beams, reinforced concrete floors and roof deck. All exposed steel has been covered with asbestos for fire protection. Trades instructed by the Department of Education on the first floor are: eight offices for administration; engine laboratory; electric, oxygen and acetylene welding; frame straightening, wheel alignment and everything pertaining to automobile repair and small engines such as outboard motors, lawn mowers, etc. On the second floor trades taught are live engines, engine laboratory, transmission laboratory, small engines testing and laboratory, seven classrooms and a draughting room which can be divided into three by two folding doors. At the end of the fiscal year renovation work had reached 85 per cent completion.

The building at 15 Breadalbane Street, Toronto, was formerly used as a Department of Public Works shop and also as a license issuing centre for the Department of Transport. Renovation by D.P.W. forces is in progress and well advanced to provide a Provincial Institute of Trades for the Department of Education. The building is about 100 feet by 110 feet, solid brick, two storeys, and it is now 95 per cent completed and occupied by 150 students.

The ground floor is mostly diesel repair and instruction. This required a separate exhaust system for 15 diesel machines. The second

floor has been reconstructed with structural steel and reinforced concrete to allow floor load to take automobiles. A skidproof reinforced concrete ramp was constructed for vehicles from street level to second floor. The entire second floor area was provided with a two-inch thick hardened floor surface. The second floor ceiling, or roof, had to be reinforced due to frame construction. The main structural carrying beams were reinforced top and bottom to take fire proofing plaster load which entailed three-eighths-inch steel plate applied to existing beams with continuous arc welding. Wood joists were reinforced with additiona joists and solid bridging.

Extensive mechanical, electrical and general trades work was carried out — new electrical distribution and lighting, new washroom accommodation for students and staff, complete new heating system, new 1,000 gallon underground oil storage tank, sprinkler heads and mains at second floor level, fire mains and cabinets on both floors.

A new front entrance and rear exit doors were supplied. All exposed structural steel was covered with one-and-a-half-inch asbestos for fireproofing. All columns were covered with asbestos to within seven feet from the floor and encased in haydite block from the floor up. Quarry tile and cove base was installed in all washrooms.

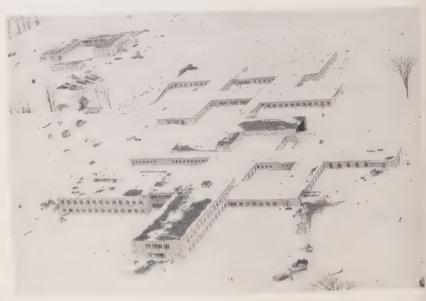
Facilities for auto body repair and spray painting, classroom and office location, were required on the second floor. This necessitated installation of a complete spray painting booth, dry oven priming booth and paint mixing room and installation of air, oxygen and acetylene stations at various locations. The building has been completely spray stations at verious locations. The building has been completely spray painted inside with fire-retardent paint for fire protection. A building, 34 feet by five feet, for the storage of oxygen and acetylene was erected at the west elevation of the building. It is of brick construction and includes a parking attendant's office.

At the Provincial Institute of Trades, 21 Nassau Street, Toronto, structural alterations and partitions were erected on the ground floor to form a Health Centre; the second floor was renovated for accommodation of the C.V.T. section; partition alterations were made at No. 3 building to provide Home Appliance classrooms and hydro underground vaults were installed.

Minor work was undertaken at other educational centres including the Ontario School for the Deaf, Belleville; the Ontario School for the Blind, Brantford; the Provincial Institute of Mining, Haileybury; the Institute of Technology, Hamilton; Teachers' College, Hamilton; Teachers' College, London; Ontario Athletic Leadership Camp, Longford Mills; Teachers' College, North Bay; Eastern Ontario Institute of Technology, Ottawa; Teachers' College, Ottawa; Teachers' College, Peterborough; Teachers' College (Pape Avenue), Toronto; and Teachers' College (Carlaw Avenue), Toronto.

# For The DEPARTMENT OF HEALTH

The new theories in the treatment of the mentally ill have required extensive changes in the design and construction of mental hospitals. The new policy adopted by the Department of Health is to have smaller hospitals in various sections of the province where patients can be treated closer to their homes. The Department of Public Works has worked with the Department of Health on this new concept. The first of the new-style hospitals to be built was started at Goderich in November 1960 and, six months later, a start was made on a similar hospital at Owen Sound. Both are of one and two-storey construction, of modern design, simulating a cottage layout with small wards providing adequate



Aerial view of the new Ontario Hospital, Owen Sound.



Chapel, connecting corridor and "C" and "D" Wing of the Infirmary, Ontario Hospital,
Goderich.



Construction of Wings "A" and "B", Ontario Hospital, Goderich.



Dining room and service kitchen showing ceiling radiant heating, Ontario Hospital,
Goderich.

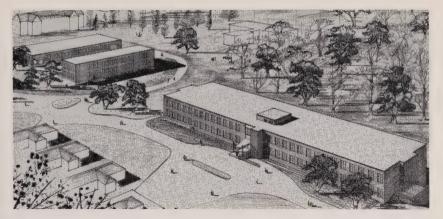


Corridor showing low partitions, Ontario Hospital, Owen Sound.

day care and recreational space. Each accommodates 300 beds and provides services in their respective areas for populations of between 80,000 and 90,000. The contract award for Goderich — \$3,505,506 — went to Anglin-Norcross Ontario Ltd. of Toronto. The Owen Sound award was made to Ellis-Don Ltd. of London, at \$3,030,728. At the end of the period under review estimated completion at Goderich was 85 per cent and Owen Sound 70 per cent. When completed they will include all the newer concepts of psychiatric services and treatment including an out-patient department for both adults and children and beds for day care and short term in-patient treatment.

A plaque commemorating the official opening of the multimillion dollar 1,250-bed Ontario Hospital School for Retarded Children at Cedar Springs (Chatham) was unveiled by the Lieutenant-Governor of Ontario, the Honourable J. Keiller Mackay, D.S.O., V.D., Q.C., LL.D., D.C.L., on June 14, 1961.

Another big job is under way at the Ontario Hospital School, Orillia, with the construction of a 300-bed pavilion, laundry and trades buildings and connecting tunnels. This was contracted to Angus Robertson Ltd., Toronto contractors, for \$2,003,000. Work on these buildings started early in October 1961 and marks the first major step in replacement of the oldest sections of Ontario's original mental hospital. Need for



Perspective of the new pavilion, trades and laundry buildings, Ontario Hospital, Orillia.

replacement of sections of this hospital has been apparent for several years, but it was not possible until the patients could be moved elsewhere. This was accomplished by the purchase of the former Gravenhurst Sanitarium and the opening of Cedar Springs Hospital School.

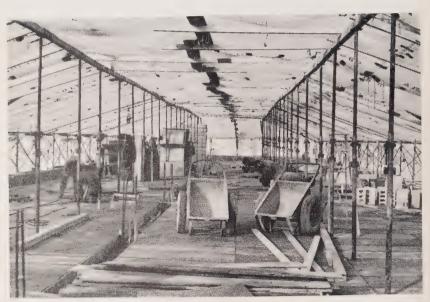
The new pavilion will be "I"-shaped, 365 feet long by 78 feet wide, comprising basement and first and second floors. The dining area, kitchen and servery will be in the basement. The two upper floors are wards — female patients on one side and male on the other. There will be day rooms on each floor and around the central core of this building will be utilities such as nursing stations, laundry, examination rooms, washrooms and showers. All floors will be serviced by a central elevator. Running the length of the structure will be an exterior play area 30 feet wide.

The laundry will be a one-storey 200 by 80-foot building with partial basement. Structurally, it will be a pre-stressed job with exposed double-T slabs. It will be completely fireproof and will be equipped with most modern and efficient equipment.

The trades building is a two-storey and basement structure 170 feet long and 48 feet wide. The foundation and basement are of reinforced concrete and the upper section faced brick. The first floor will consist of various trades shops while the second floor will serve as a training area for patients. Underground tunnels will link all the new buildings and also link up with the existing tunnels in the old buildings. Construction has advanced to these stages: pavilion 15 per cent; laundry 60 per cent; trades building 60 per cent; connecting tunnels 70 per cent.



Winter construction at the trades building using the polyethylene film envelope,
Ontario Hospital, Orillia.



Interior view of construction under the polyethylene film envelope, Ontario Hospital,
Orillia.

Hon. Leslie M. Frost, Q.C., LL.D., D.C.L., Prime Minister of Ontario, officially opened the new Radiation Protection Laboratory at the Central Laboratory, Toronto, (360 Christie Street) on July 6, 1961. This building is about 101 feet by 51 feet, single storey with partial

basement, 51 feet by 23 feet, at the south end. It projects off the existing building pointing north toward Melita Street and is used for the measurement of environmental radio-active contamination of such things as water, milk, food or rain as it affects the safety of the public. Fassel Construction Company Ltd., Toronto, were awarded a \$174,890 contract for this job.

The contract for construction of a new laundry building for the Ontario Hospital at London was awarded on December 27, 1961, to W. A. McDougall Ltd. of London for \$472,868. The new laundry will be 200 feet by 82 feet and will be located north of the new powerhouse built last year. It consists of a partial basement and first floor and is of masonry and reinforced concrete construction. Service rooms such



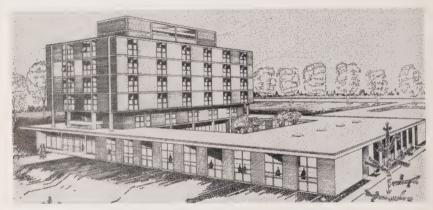
The new laundry building, Ontario Hospital, London.

as mechanical rooms, salt room, waste water tank, pumps and compressors will be in the basement. On the first floor will be the main laundry rooms, sorting room, lunchroom, offices, staff washrooms and locker rooms, the electrical room and space for storage and shipping. The new laundry will be large enough to serve not only the present requirements of the institution, but will also be able to take care of any future requirements. Foundation and structural slab work were completed on this building. Some backfilling was done and erection of exterior brick has started. All work on the powerhouse project at this location has been completed. The new boilers were put into operation and are now supplying all power for the hospital. The new powerhouse was registered

and turned over to the Department of Health on July 20, 1961, to complete the project.

In January 1962 the contract for a new School of Nursing to be built on the grounds of the Ontario Hospital, Whitby, was awarded to Newman Bros. Limited, St. Catharines contracting firm, for \$993,407. Jackson Ypes & Associates of Toronto are the associate architects. Work started March 6 setting out, clearing the site, and erecting sheds.

The school, which will be built in a campus-like setting, will provide facilities for training student nurses for Ontario Hospitals. The reinforced concrete structure will rise seven storeys. The ground floor will contain administration and instructional areas, while a six-storey slab will rise to provide living-in accommodation for 156 students in single and double bedrooms.



Perspective of the School of Nursing under construction at the Ontario Hospital, Whitby.

The main entrance leads into an attractive reception and waiting area featuring a wall of natural marble. The instructional wing is designed around a landscaped inner courtyard, the whole being linked to and forming an extension of, the main building. In addition to regular classrooms, there are demonstration rooms, a laboratory and dietetics room. The bedrooms in a typical floor are designed around a core comprising the washroom and locker facilities, stairwells, self-service elevator and student lounge with kitchenette. Bedrooms contain built-in wardrobes, dresser and desk units. For off-duty hours, students will have two large outdoor balconies on the second floor and a spacious sundeck on the roof. The basement provides a large recreation area, a kitchen with light cooking facilities and a laundry equipped with automatic washers and dryers.

Work on this project had advanced to these stages as of March 31, 1962: preparation of site 90 per cent; excavations 70 per cent; foundations 50 per cent.

Erection of the two 33 by 23-foot additions to the dining rooms at the Male and Female Pavilions and reconstruction of the serveries and installation of two elevators was completed at this hospital. Alterations in the Male Infirmary to form a morgue were also completed. An extensive program of renovation and maintenance was carried forward

Construction of the 300-bed Clinical Services Group of buildings at the Port Arthur Ontario Hospital is substantially finished. General contractor for this \$2,550,777 project was the Bird Construction Co. Limited of Port Arthur. The new unit comprises three wings — the Central Building and Male and Female Wings — and is located between the existing Administration Building and the Kitchen-Reception Building on the Ontario Hospital site. Furnishings and equipment were being received in considerable volume. The powerhouse addition was completed in March 1962, and the boiler was given some performance tests. Sillman Co. Limited, Port Arthur general contractors were given a \$174,930 contract for this job.

An extension to the Infirmary Building at the Ontario Hospital, Hamilton, was built during the year to provide a dining room and servery. This addition will take care of the distribution of food to the Infirmary and will link up with the big kitchen at the new Seniles Building. The building is about 31 feet by 26 feet and comprises foundation and two floors. Dining rooms and serveries are on both floors. Construction is concrete foundation, brick walls, lath and plaster.

The Crombie Building at the Psychiatric Research Institute for Children at Byron was renovated. This work covered considerable alterations in regard to fire doors, fire alarm, fire stairs, new electroencephalograph and sound rooms, plumbing, heating, electrical, painting, etc. The project started October 8, 1961, was completed in March 1962 and most of the furniture had arrived on the site.

Complete renovation of the Old Chest Diseases Unit at the Ontario Hospital, Woodstock, was finished with the completion by contract of Cottages 6 and "F". This job embraced Cottages "A" and "B", "E" and "F", 5 and 6, as well as the Reception Building. Extensive renovation and maintenance work was carried forward in all sections of this hospital during the year.

Various installations, repair and renovation work, and works of a comparatively minor nature were undertaken at many other Ontario Hospitals. These included Aurora, Brockville, Cobourg, the Mowat, Rockwood and Westwood Divisions at Kingston, New Toronto, North Bay. Penetanguishene, St. Thomas, Smiths Falls, Toronto (999 Queen Street West), Thistletown, the Ontario Hospital Annex at Gravenhurst, and Whitby.



The new Nightingale School of Nursing, Toronto.

### For The ONTARIO HOSPITAL SERVICES COMMISSION

Construction of the Nightingale School of Nursing, started in February 1961 on a site at the northwest corner of Elm and Murray Streets, Toronto, directly behind the Mount Sinai Hospital, and donated by this hospital, was well advanced with completion estimated at 85 per cent at the end of the fiscal year. Finish work was being proceeded with at this time. Associate architects were Craig, Madill, Abram and Ingleson of Toronto. The \$1,170,000 contract for this job was awarded to Hurley-Gregoris Construction Co. of Weston.

The new residence-school will provide accommodation for 138 resident student nurses in a six-storey slab block rising above two academic and administrative floors. It will be linked to Mount Sinai Hospital with a pedestrian and steam tunnel to provide heating from a central plant.

The new Headquarters Building for the Ontario Hospital Services Commission on Yonge Street, just south of Eglinton Avenue, Toronto, was officially opened by the Prime Minister of Ontario, the Honourable Leslie M. Frost, Q.C., LL.D., D.C.L., on September 14, 1961.

Partial renovation and redecoration of the fifth and sixth floors was completed at 221 Elizabeth Street, Toronto.

## For The DEPARTMENT OF HIGHWAYS

The building program instituted in 1955 for the Department of Highways to extend over a period of years, was furthered this year with the construction of a District Repair Garage and 18-bay Heated Storage Building, a 10-bay garage, a 6-bay garage, four 5-bay garages and six four-bay garages.

Construction of the Sault Ste. Marie District Repair Garage and 18-bay Heated Storage Building started in the fall of 1961. These buildings are situated in Tarentorus Township opposite the existing Department of Highways Garage and Storage buildings, outside Sault Ste. Marie. Newman Bros. Ltd. of St. Catharines are general contractors. The contract was for \$524,355.



New District Repair Garage and 18-bay Heated Storage Building, Sault Ste. Marie, substantially completed.

It is anticipated this project will be completed by April 30, 1962. The project consists of a one-storey District Repair Garage Building, 165 feet by 92 feet, and an 18-bay Heated Storage Building 325 feet by 42 feet. The Repair Garage is divided into storage, stockroom, office, tools, electrical and locker room, male and female washrooms and lunchroom. Construction is of exterior face brick and concrete back-up. Interior partitions are of concrete block with the exception of office and washroom areas which have a plaster finish. The tar and gravel roof is supported on steel columns and long span steel joists. Precast roof slabs were used as roof decking.

Work on this job began August 1, 1961, with excavation on August 7th. Only minor work remained to complete the project by March 1962. All unit sub-station equipment was installed and power turned on; heating boilers were operating and tested; resilient tile floors were being laid in office areas and interior painting was in progress with finishing work on base and copper flashings for roof in progress.

Construction of the 10-bay garage at Grafton, reported under construction last year, was completed. Jordan Construction Management Ltd., Toronto, did the work for a \$97,000 contract price. This is a one-storey structure 198 feet long, 42 feet wide and 19 feet in height. It is of brick, concrete and steel joist construction with flat roof and concrete foundation. Contained in the building are 10 garages with wooden overhead doors, tool and storage rooms, lunchroom, washrooms and small office. It is situated just north of Grafton on Highway 401 and serves the area between Cobourg and Port Colborne.

At Cloyne, Goshen, Nagagami, Minden, Wallaceburg and White-fish four-bay metal patrol garages are under construction. The Whitefish garage is more or less typical. This building is 40 feet by 66 feet eight inches plus a 40 by 16-foot office section. The structure is supported on reinforced concrete walls between piers. Walls are topped with eightinch high ribbed metal siding and the roof is supported by rigid steel structural steel frame. Interior finish is steel and gyproc, painted; floors are reinforced concrete on fill; windows and garage type doors

and pedestrian doors are included. Heating is by forced warm air oil furnace; plumbing and drainage — domestic hot and cold water, roof and floor drains, oil pumps and soak pits, septic tank and tile bed, air compressor and air pumping system; electrical work includes an incoming service, electrical site services and equipment, lighting fixtures, panels, outlets, clock and other accessories, exterior lighting and connections to equipment. Of these projects, Wallaceburg was the only one fully completed.

Five-bay patrol garages were essentially finished at Durham, St. Mary's, Strathroy and Walkerton.

The six-bay metal patrol garage at Crystal Beach, near Brockville, was started late in 1961 and was substantially finished at the end of the year.

Construction of the paint shop addition at the District Office and Garage at Ottawa, advanced to the point where the building was occupied by the Department of Highways in February 1962. By March, interior work was completed with the exception of the fresh air unit and a general clean-up.

Complete maintenance of the Downsview group of buildings in Toronto was carried out by Department of Public Works forces.

An extension to the District Office Building at Huntsville was under construction and 30 per cent completed. This is a small frame basement and first floor building.

Routine alterations and renovations were done at Beardmore, Haliburton, Lambeth, Kenora, Blind River, Port Hope, Nipigon, Norwood, Sioux Lookout and Sudbury. Furnaces were installed in salt sheds located at Bancroft, Killaloe, Ormsby and Pembroke.

Ready for tender were an eight-bay patrol garage for Morriston and an 11-bay patrol garage for St. Catharines (Homer).

## For The DEPARTMENT OF LANDS AND FORESTS

The major building project for the Department of Lands and Forests was construction of a new Chief Ranger's Headquarters building at Parry Sound. Construction began in November 1961 and by March 1962 the structure was about 50 per cent completed. Konvey Construction Co. Limited of Kingston received a \$166,568 contract award for this project.



Winter construction at the Chief Ranger's Headquarters at Parry Sound.

The new building is being constructed on the existing Lands and Forests site on the waterfront. It is single-storey, of steel, brick and concrete construction with brick face, about 180 feet long and 65 feet wide with an 80 by 24-foot wing section. It will contain a large staff office as well as offices for the chief ranger and biologist, a radio room, meeting room, stockroom and boiler space. Provision is also made for warehousing facilities, carpentry and paint shops, and a repair garage for vehicles, pumps and outboard motors.

The 11-bay District Office Building at Geraldton, reported substantially completed and occupied by the Department of Lands and Forests on February 15, 1961, was scheduled for official opening ceremonies on July 10, 1961. Further work was maintained at this site during the year and by March, 1962, interior furnishings had been received, a new walk-in refrigerator installed, and landscaping and gravelling of driveways completed. J. E. Dagsvik, Port Arthur contractor, received a \$213,600 contract for this work.

In the pre-engineering stage at the Headquarters and Air Base at Sioux Lookout, was a project to create a complete waterworks system from the lake, fire protection, wet well and pumphouse, new domestic services connections to buildings, a network of fire mains, hydrants and isolating valves, and bringing in a power line to supply the increased demands of the station. This is being undertaken to dispense with existing antiquated and meagre facilities.

Erection of the six-room biologist's residence at Kenora continued from the previous year. Construction of the building and land-scaping was completed in June 1961, although occupancy occurred as early as May 4, 1961.

Testing and changes continued on the temperature and humidity control system for the three growth rooms in the pathology building at the Southern Research Station at Maple.

At the Glenora Fish Hatchery, a reinforced concrete retaining wall was built and a septic tank and disposal bed completed.

Miscellaneous work was done at the Chief Ranger's Headquarters, Chapleau; the Forest Ranger School, Dorset; Chief Ranger's Office at Elk Lake; Chief Ranger's Office, Espanola; Chief Ranger's Station, Gogama; Hornepayne; Kakabeka Falls Park; District Office, Kapuskasing; Lauzon Lake Air Base; Nellie Lake; Orono Provincial Forestry Station; Air Services Division Hangar, Sault Ste. Marie; the Fisheries Research Station, South Bay Mouth; Chief Ranger's Headquarters, Sultan; Island Airport (Leased) Toronto; Upsala Ranger Station; Vermilion Bay Ranger Station; White River District Office and the Reforestation Camp at Wrong Lake.

# For The DEPARTMENT OF MINES

All rooms on the first and second floors of the Temiskaming Testing Laboratories at Cobalt were painted, and a fireproof enclosure for the boiler was erected.

Minor repairs were made at the Mining Recorder's office at Elk Lake.

# For The PROVINCE OF ONTARIO SAVINGS OFFICES

In Toronto, a new lunchroom and washroom facilities were provided in the basement of the 1556 Yonge Street Branch. The building was completely painted and a compact air-conditioning unit installed in the banking area. Decoration and minor repairs were made at the Danforth and Woodbine Branch and old lighting fixtures were remodelled at the University and Dundas Branch.

# For The DEPARTMENT OF REFORM INSTITUTIONS

Excellent progress was made on the construction of the Training School to accommodate 125 girls at Lindsay. At the year's end, structural development of the project had reached 92 per cent. Chester C. Woods of Toronto is the Associate Architect. A \$1,348,000 general trades contract was awarded to Len Ariss & Co. Limited, Guelph, for the job.

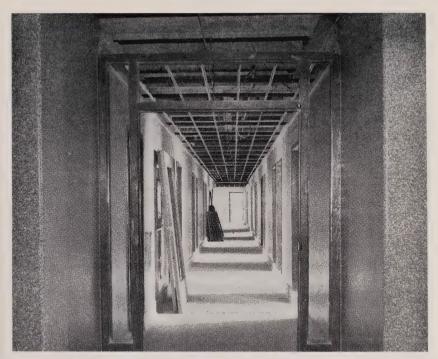


Aerial view of the new Girls' Training School at Lindsay.

This is the first of the new type reform schools to be built in the province which emphasizes academic instruction, freedom within the bounds of the institution and attractive interior decor which, it is hoped, will contribute to rehabilitation of the girls. Full medical facilities and psychiatric care are provided. Girls have individual rooms for sleeping and day rooms for group activities.

The design of the building comprises a 160 by 146-foot main block with a central 90 by 70-foot courtyard. This section is two storeys and basement. Two 35 by 28-foot extensions project on the north side with another extension, 75 feet by 37 feet, on the southern extremity. The main extension projects on the west side and is 205 feet by 65 feet. The south and west extensions are one-storey. The main floor approximates 40,000 square feet.

The building is of fire-resistant construction with reinforced concrete floors and roofs with brick faced, load bearing walls. Floor finishes are of terrazzo and resilient tile, and heating by hot water and a mechanical ventilating system to the school wing, gymnasium, lounges and recreation room. Construction of this project started August 15, 1960.



One of the corridors at the Girls' Training School, Lindsay.

A similar type institution is well advanced at Simcoe. At the end of the fiscal year this project was 65 per cent completed. The site of the new Reform School is south of No. 3 Highway on Ireland Road, near Victoria Street, in Woodhouse Township, about half a mile southeast of Simcoe. Dunker Construction Co. Limited, Kitchener, are general contractors with a \$1,284,444 contract.



Construction at the Boys' Training School, Simcoe.

The two-storey brick and concrete structure will accommodate 125 boys. A psychiatric unit will be near the administration area. There will be a single-storey wing of eight classrooms with auditorium and gymnasium nearby. Sleeping accommodation will be in eight dormitories with four beds in each and the remainder individual rooms. There will be four detention cells. In addition to vocational shops and other instructional areas, a chapel will be included in the building.

The new school building at the Boys' Training School at Cobourg is nearing completion. The Toronto firm of Lynch-Richards Construction Co. are general contractors with a \$158,000 contract. Construction of this building started October 5, 1961. It will be a one-storey brick structure almost square — 118 feet by 108 feet — of brick and concrete construction and concrete flat roof. It is located north of the existing school building.



Substantial construction progress at the new School Building, Boys' Training School,
Cobourg.

A large auditorium with stage, 74 feet by 38 feet, will be located in the centre of the building. Six classrooms, including a large manual training area, teachers' rooms, washrooms, storerooms and boiler room, surround the auditorium.

The construction program for the establishment of two new dormitories and single-staff headquarters building at the Monteith Industrial Farm was carried forward from the previous year. Hill-Clark-Francis of North Bay are general contractors with a \$707,436 contract award. Work on this job began October 17, 1960, and a description of the project was given in the previous year's Report. When completed, the dormitories will hold up to 240 prisoners. Each building has three floors, including basements, and is of concrete, concrete block, brick and steel beam construction. By March 1962, the single staff quarters were finished and No. 1 dormitory essentially completed. Temporary buildings on the site of No. 2 dormitory were removed

in preparation for construction of that building in the spring. Outside services in connection with sewage disposal were 90 per cent completed. Other routine work was carried out.

At the Ontario Reformatory, Mimico, the new powerhouse, begun in February 1961, was substantially completed and it was expected the building would be turned over to the Department of Reform Institutions during April 1962. Wilkinson Construction Ltd. of Toronto were general contractors for this \$212,176 project. Other work at this institution comprised reconstruction of No. 2 dormitory to provide an Alcoholic Clinic, dismantling of the brick plant chimney and routine alterations.

Renovation, repairs and alterations of an extensive nature were carried out at Bowanville Training School for Boys; Burtch Industrial Farm; Camps 1, 2 and 5 of Burwash Industrial Farm; Boy's Training School, Cobourg; Fort William Industrial Farm; Ontario Training School for Girls, Galt; Ontario Reformatory, Guelph; Ontario Reformatory, Millbrook, and the Andrew Mercer Reformatory, Toronto.

#### DISTRICT JAILS

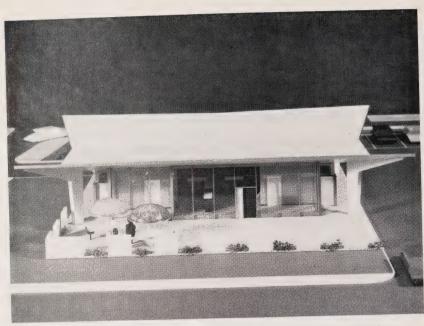
Construction of three additional wings to the Jail Building at Kenora, first begun in May 1959 and essentially completed at the end of the previous fiscal year, was fully completed in May 1961. New fluorescent lighting is being installed in the administration section.

Minor repairs were done at Fort Frances, Haileybury, North Bay, Port Arthur and Sudbury.

# For The DEPARTMENT OF TRANSPORT

Complete maintenance of the Driver Examination Centre at Downsview is carried out by Department of Public Works forces. During the year frequent minor partition alterations and installation of storage cupboards were made as well as frequent rearrangement of precast bumpers in the testing area.

At the Oshawa Shopping Plaza Driver Examination Centre, minor relocation of partitions originally installed by Department of Public Works workmen were modified and added to, providing smoother office procedure.



Photograph of the model of the new Tourist Reception Centre at Windsor.

# For The DEPARTMENT OF TRAVEL AND PUBLICITY

The new Tourist Reception Centre, which has been under construction since the latter part of 1959 at the confluence of Highways 400, 11 and 27, south of Barrie, was completed and occupied with the formal opening planned for June 16, 1961. The area was paved and landscaping was completed in the late fall of 1961. The premises were later boarded up and the complete system drained for the winter months. Reopening was expected about May 24, 1962. This project was contracted to Bertram Bros. Ltd. of Barrie, for \$33,347.

General maintenance work was done at the following reception centres: Fort Erie, Fort Frances, Ivy Lea (at Thousand Islands Bridge), Niagara Falls, St. Catharines (Homer).

# HISTORICAL SITES

Plaques marking historical sites were erected at Kenora, North Bay and Port Arthur.

# For The ONTARIO WATER RESOURCES COMMISSION

Extensive installation of underground piping was made at the Laboratories Research Building on Highway 401 in Etobicoke Township. The installation consisted of about 350 lineal feet of six-inch mechanical joint pipe from the northeast elevation of the laboratory building, east under the paved driveway, down a steep bank, and southeast across the flat area to a point roughly 40 feet from the Humber River tributary. The installation of this piping system was required by Water Resources in order to run frequent pollution tests. The work was necessary in order to combine intake and flush lines, plus the pumphouse, which is being installed under contract and is 95 per cent completed.

# For The ONTARIO GOVERNMENT EXHIBITS

The Canadian National Exhibition was held from August 18 to September 4 in 1961. The Department of Public Works prepared the Province of Ontario Building in Exhibition Park for the annual show, as in former years, and worked in close liaison with the exhibiting departments subsequent to and during the assignment of space. All carpentry work, painting, special feature lighting and floral and evergreen decorations required to establish suitable settings were provided, as well as staff to supervise and maintain the whole in excellent condition during the 15-day run of the Exhibition.

The 300-seat movie theatre was a feature of this Exhibition and was equipped, staffed and managed by the Department of Public Works. It had formerly been operated by the Motion Picture and Theatre Inspection Branch of the Department of Travel and Publicity.

Exhibiting were the Departments of Agriculture, Attorney General, Economics and Development, Education, Health, Highways, Labour, Lands and Forests, Mines, Provincial Secretary and Citizenship, Public Works, Reform Institutions, Transport, Travel and Publicity, and Water Resources.

The Central Canada Exhibition was held in Ottawa from August 18 to August 26, 1961. The Department of Public Works organized and prepared the display areas allotted to the Ontario Government.

Displays were prepared by the Departments of Agriculture, Health, Highways, Lands and Forests, Planning and Development, and Reform Institutions, featuring departmental functions of current interest.

# BOILER INSPECTION

The boiler inspection work of this Department, as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario Hospitals and Reformatories, the reports as referred to were sent to the Departments of Health and Reform Institutions respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir,

Your obedient servant,

A Stareda.

D. G. Creba,

Chief of the Architects' Branch.

Toronto, March 31, 1962.

# REPORT OF THE CHIEF OF THE PROPERTY AND SURVEYS BRANCH

Parliament Buildings, Toronto, Ontario, March 31st, 1962.

Mr. J. D. Millar,
Deputy Minister,
Department of Public Works,

Below is a Summary of the work accomplished by members of the Property and Surveys Branch during the fiscal year 1961-1962.

96	Purchases		\$1,409,601.50
122	Leases		1,953,300.64
31	Sales		57,372.50
9	Appraisals		1,000.00
		_	
258	Transactions		\$3,421,274.64

The totals for the previous three years were:

$1958-59 - 210 \mathrm{T}$	ransacti	ions —	\$ 2,491,282.43
1959-60—194	,,	_	12,453,472.73
1960-61-235	22		3,012,788.52

#### PROPERTY MANAGEMENT SECTION

Taxes	79 Items	\$ 74,418.39
Insurance	59 Premiums	49,363.49
Revenue from Property	218 Collections	909,721.21
Requisition of Rent	2,636 Payments	1,046,695.39

#### SURVEYS DIVISION

Of the 118 Survey Requests submitted to the Surveys Division 103 have been completed with work under way or scheduled on the remainder. As the work load permits, progress is made in the preparation of proper plans of the many properties located throughout the Province.

During the year the responsibility of reviewing appraisals prepared by the 30 Conservation Authorities for their acquisition of property was delegated to the Branch. Negotiations for the leasing of space for the Department of Highways was also assumed.

A special assignment was the arranging with the Sisters of St. Joseph for the demolition, under their supervision, of the Convent buildings situated on the land recently acquired from them. This was one of many diverse matters handled by the Branch.

Aside from the interest generated in this property, due to the planned Queen's Park Development, there was an interesting sidelight in this matter. The well-known artist, Mr. Franklin Arbuckle, R.C.A., O.S.A., had tried without success to secure quarters large enough to paint a mural for the new City Hall in Hamilton. When he made his needs known, it was still possible to retain the gymnasium long enough for him to complete his mural.



Aerial view of demolition of former St. Joseph's Convent, Toronto.



Last stage of demolition of buildings of former St. Joseph's Convent, Toronto.

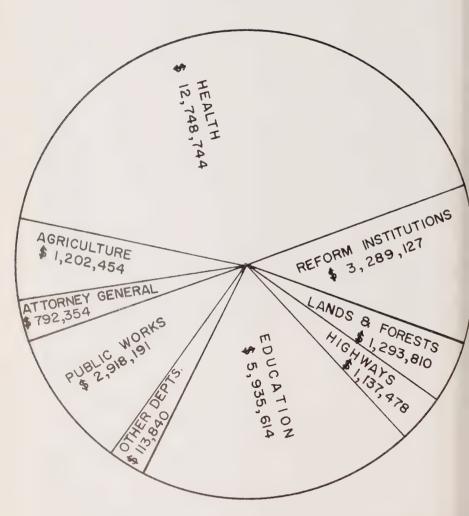
The foregoing is a brief report of the activities of the Branch in attempting to take care of the needs of the various Departments in the acquisition, leasing, management and disposal of property.

Respectfully submitted,

E. J. Parker, Chief of the Property and Surveys Branch.

arkes

# ONTARIO DEPARTMENT OF PUBLIC WORK CAPITAL EXPENDITURE 1961-62



NEW CONSTRUCTION and CAPITAL IMPROVEMENTS s 29,431,612 (Gross).

## REPORT OF THE CHIEF OF THE ACCOUNTS BRANCH

Department of Public Works, Ontario, Toronto, March 31, 1962.

Mr. J. D. Millar, Deputy Minister of Public Works, Parliament Buildings, Toronto, Ontario.

Sir:

I have the honour to submit detailed statements of Ordinary Expenditure of Civil Government and maintenance and repairs of Government Buildings and Public Works; also Capital Expenditures on Provincial Government Buildings and Public Works, during the fiscal year which ended on the 31st of March, 1962.

I have the honour to be, Sir,

Your obedient servant,

A. A. Easson,

A /a Easson

Chief of the Accounts Branch.

# REPORT OF THE ACCOUNTANT

Operations of the Department continued at a level similar to that of the previous fiscal year, the following figures showing a small percent decrease in total expenditures:

EXPENDITURES Fiscal Year 1961-62 1960-61		<i>Ordinary</i> 1,221,089.39 0,803,113.99	Capital \$29,330,195.61 32,066,919.48	Total \$40,551,285.00 42,870,033.47	
	\$	417,975.40	\$ 2,736,723.87	\$ 2,318,748.47	
Percent Increase Percent Decrease		3.87%	8.53%	5.41%	
SUMMARY OF EXPENDITURES For Fiscal Year April 1st, 1961, to March 31st, 1962					
Service Main Office —		Ordinary	Capital	Total	
Administration expenses, etc.	\$	1,327,757.31		\$ 1,327,757.31	
Maintenance and Repairs – Government Buildings	_	8,847,917.80		8,847,917.80	
Public Works — Dams, Docks, Locks, etc.		112,347.64	929,780.13	1,042,127.77	
Public Works — Aid to Drainage		682,211.59	28,400,415.48	682,211.59 28,400,415.48	
Public Buildings Miscellaneous		250,855.05		250,855.05	
	\$1	1,221,089.39	\$29,330,195.61	\$40,551,285.00	
Commission on telegraphs and telephones Sale of Material Rentals Perquisites Building Equipment Miscellaneous Sale of Property In trust re: Downsview Cafeteria Plan and Contract	\$	14,197.42 15,562.50 933,178.91 4,190.90 2,063.38 8,876.65	38,108.13 38,108.13 6,219.01	933,178.91 4,190.90 2,063.38 8,876.65 733,298.93 6,219.01	
Security Deposits	_		17,060.00		
	\$	978,069.76	5 \$ 794,686.0	1 \$1,772,755.83	

A. A. EASSON, Chief of the Accounts Branch.

# STATEMENT OF EXPENDITURES, MAIN OFFICE MAINTENANCE, REPAIRS AND CONSTRUCTION OF PUBLIC BUILDINGS

For Fiscal Year Ending March 31st, 1962

#### ORDINARY

Service	Amount	Amount
MAIN OFFICE		
Minister's Salary	\$ 12,000.00	
Salaries	966,622.15	
Travelling Expenses	13,207.63	
Maintenance	98,146.16	
Insurance	56,506.19	
Local Improvement Taxes, etc	54,686.73	
Unforeseen and Unprovided	59.33	
Compensation — Medical, etc. for Injured	72.017.66	
Workmen	72,017.66	
Unemployment Insurance	54,511.46	\$ 1,327,757.31
		\$ 1,521,757.51
ONTARIO GOVERNMENT BUILDINGS		
Salaries — Maintenance Staff	3,266,072.97	
Maintenance, fuel, light, etc	822,334.89	
Horticulture and Upkeep of Grounds	25,000.00	
Communications Services	778,436.89	
Typewriter Servicing — Toronto		
Departmental Offices	44,901.36	
Furniture, Furnishings and Equipment	34,908.90	
Repairs, Alterations and Incidentals	2,901,605.64	
	7,873,260.65	
Deduct Rentals	3,000.00	0 0 0 0 0 0 0 0 0
		\$ 7,870,260.65
LEASED PREMISES		
Rentals and Expenses		\$ 977,657.15
MAINTENANCE OF LOCKS, BRIDGES,		
DAMS AND DOCKS, ETC.		
Maintenance		\$ 112,347.64

Service	Amount	Amount
AID TO DRAINAGE		
To provide for grants in aid of drainage work in accordance with The Provincial Aid to Drainage Act, 1954\$	649,998.59	
Salaries and expenses in connection with preparing drainage schemes, and for construction, improvement or re-construction of trunk channels for farm drainage in Northern Ontario, including expenses in connection with drainage works which may qualify for grants under The Provincial Aid to Drainage Act, 1954	32,000.00	
Municipal Drainage, including grants in aid thereof	213.00	\$ 644,100.50
MISCELLANEOUS		
Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith	44,903.21	
To provide for grants towards the cost of construction of new jail accommodation as may be directed by the Lieutenant-Governor in Council	114,897.19	
Aid — Dredging — Muskoka  Dredging in the Muskoka Lakes	30,625.21	
Aid — Remedial Works, etc. — Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor in Council	51,327.26	
Grant — City of Toronto —  Re: Repairs to the Ontario Government Building at the Canadian National Exhibition, Toronto	9,102.18	
_		\$ 250,855.05
TOTAL ORDINARY EXPENDITURE		\$11,221,089.39

## CAPITAL

Service	Amount	Amount
PUBLIC BUILDINGS		
To provide for the construction of new buildings and works, purchase of lands and buildings, alterations, equipment and extension of services to existing buildings and works and the purchase of construction plant and equipment and materials for stores and expenses in connection therewith		\$28,400,415.48
DAMS, DOCKS AND LOCKS		
Construction of dams, docks and locks		929,780.13
TOTAL CAPITAL DISBURSEMENTS		\$29,330,195.61
SUMMARY		
ORDINARY EXPENDITURE		
Main Office, Maintenance and Repairs of Government Buildings		\$11,221,089.39
CAPITAL DISBURSEMENTS		
Public Buildings and Public Works		29,330,195.61
		\$40,551,285.00

A. A. EASSON, Chief of the Accounts Branch.

Toronto, March 31st, 1962.

# REPORT OF THE CHIEF OF THE CIVIL ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31st, 1962.

Mr. J. D. Millar, Deputy Minister, Department of Public Works.

The work performed under the supervision of the Chief of Civil Engineering Division during the fiscal year 1961-62 was as follows:

## 1. HYDRAULIC SECTION

# (A) DAMS, DOCKS, LOCKS, ETC.

## Summary:

The investigation, pre-engineering, design, construction, inspection and approval of the work on dams, docks, locks, etc., was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas. Dredging work was carried out in the Muskoka area.

One concrete fishway and one timber dam, previously commenced, were completed. Seven concrete dams and one timber dock were started this year and were completed. Work on two concrete dams, one rock filled dam and one fish hatchery was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

# BARLOW LAKE DAM, Jennings Township, Sudbury District

The old timber dam which controlled the water levels in Campbell and Barlow lakes had deteriorated beyond repair and could not maintain water level in the lakes. Upon request of the Department of Lands and Forests, a temporary rock filled plug dam was installed to remedy the situation. A permanent crest overflow dam, into which the present plug dam will be incorporated, will be constructed next fiscal year.

## BASSWOOD LAKE DAM, Day Township, Algoma District

A new reinforced concrete dam was constructed at the outlet of Basswood Lake to replace an old timber dam which was originally installed by lumbering interests about 80 years ago.

The work was requested by the Department of Lands and Forests to protect the interests of the cottage and summer resort owners who have lately suffered considerable hardship because of low water level in the lake.



The new control dam, Day Township, Algoma district, Basswood Lake Dam.

The new reinforced concrete dam is based on solid rock, is 143 feet long, has two steel gates (three feet by four feet and four feet by four feet respectively) and an overflow wing wall with a 64 feet long crest. The steel gates allow for close regulation of the lake level and for continuous minimum flow to meet the requirements downstream from the dam. The head of water from the gate sill to the regulated water level is six feet and the top of the operations platform is three feet six inches above that level. The operations platform is equipped with pedestal lifts for operation of the gates and with a steel pipe hand rail.

The project was completed November 2nd, 1961.

# BEAR (KAOTISINIMIGO) LAKE DAM, Hammell Township, Nipissing District

Reconstruction of the dam at the outlet of Bear Lake was requested by the Department of Lands and Forests to facilitate navigation between Bear and Poplar Lakes.

The new dam was constructed with reinforced concrete. It is based on solid rock, is 90 feet long, has one steel gate three feet square and an overflow wing wall with a sixty foot long crest. The head of water measured from the gate sill to the regulated water level is four feet three inches and the operations platform is four feet above that level. The operations platform is equipped with a pedestal lift for operation of the gate and with a steel pipe hand rail.

The project was completed September 27th, 1961.

# BIRCH (GOUGH) LAKE DAM, Shakespeare Township, Sudbury District

The dam at the outlet of Birch Lake was originally constructed in 1926 for power generation purposes. In 1956 the water power lease was cancelled and the property was reverted to the Crown. In 1961 the dam was found to be deteriorated beyond repair and the Department of Lands and Forests requested its reconstruction.

An access road about two miles long, was built to the site, camp buildings were erected and concrete aggregate was brought in. The construction work will be carried out next fiscal year.

# BLINDFOLD LAKE DAM, Kirkup Township, District of Kenora

The rock filled timber dam at the outlet of Blindfold Lake was originally built by a timber operator. In 1960 the dam was found to be deteriorated beyond repair and the Department of Lands and Forests requested its reconstruction and the construction of a portage to allow boat traffic to pass between Lake of the Woods and Blindfold Lake.

The new dam and a marine railway were designed by the Civil Engineering staff of this Department and the bulk of the construction work was carried out during this fiscal year. Landscaping and completion of the marine railway will be done early next season.

Of reinforced concrete construction, the dam has an overall length of 103 feet with three 14 foot sluiceways. The head of water retained by the dam, measured from the sluiceway sill to the regulated water level is five feet and the top of the deck is four feet above that level. The sluiceways are fitted with steel chases and timber stoplogs.

The deck of the dam is 58 feet long, 25 feet four inches wide and 16 inches thick. It has been designed to serve as a bridge for access to new recreational areas.

The marine railway is about 250 feet long, with a concrete dock at the Blindfold terminus and a floating timber dock on the Lake of the Woods end. A trolley to carry boats across will be operated by a hand-winch.

# PROVINCIAL FISH HATCHERY — CHATSWORTH Holland Township, Grey County

The Department of Lands and Forests requested the reconstruction of the rearing portion of the hatchery.

The work involves construction in reinforced concrete of 14 circular ponds, three dams, 20 raceways and a screening chamber. In addition four asbestos cement lined ponds and two display ponds are to be constructed. Approximately 2,000 lineal feet of six inch dia. to 24 inch dia, supply and waste pipes are to be laid and landscaping and paving of portions of the area will be undertaken.

Work commenced on August 25th, 1961, with excavation being carried out in the circular pond and screen chamber areas. The circular ponds are 25 feet in inside diameter. Seepage from natural springs in the circular pond area required extensive excavation and backfilling to produce a stable foundation. In addition a two feet six inch layer of crushed stone and a six inch perforated pipe drain system were installed to control the seepage.

Winter concreting was carried out in the construction of a 26 feet by 14 feet by eight feet three inch screen chamber and in the circular ponds.

As of April 1st, 1962, nine circular ponds, the screen chamber, and supply and waste lines in the circular pond area had been completed and work had commenced on the first of the three dams. The remaining portion of the construction will be carried out next fiscal year.

## GO-HOME LAKE DAMS, Gibson Township, Muskoka District

The main dam at the south outlet of the lake and the plug dam at the west outlet were completed last fiscal year. This year, a channel was excavated through a narrow neck of land between the upper and lower portions of Go-Home Lake, to improve the flow to the dam and to provide for safe navigation between the two portions of the lake. The new channel is approximately 100 feet long and 30 feet wide and measuring from the normal regulated water level, is five feet deep.

# DOCK AT ONTARIO FIRE COLLEGE, Gravenhurst, Muskoka District

The dock required for landing of fire fighting craft was reconstructed with gravel filled timber cribs. The new dock is L-shaped with the main section 46 feet four inches long and 16 feet wide and the transverse leg 28 feet long and 11 feet wide. Exploration of the sub-surface and soils tests conducted on the site revealed a layer of highly saturated clay to a depth of 70 feet. To cope with the low bearing capacity of the foundation, the cribs were made with a solid plank floor which should distribute the weight of the structure evenly over a larger area and keep the pressure within the allowable limits.

The dock was completed and put into operation on July 21st, 1961. A permanent surface will be placed on the dock during the next fiscal year.

# PROVINCIAL FISH HATCHERY, HILLS LAKE Bryce Township, Temiskaming District

The Department of Lands and Forests requested reconstruction of approximately 1,200 lineal feet of an existing open concrete water supply flume which had deteriorated beyond repair.

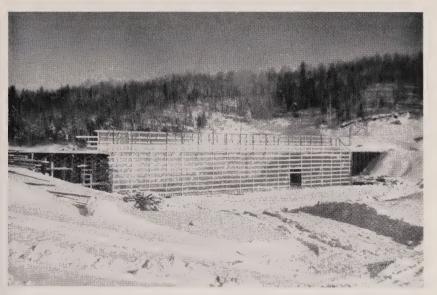
The 36 inch diameter asbestos cement pipe line was installed below ground level and parallel to the section of flume to be replaced. An entrance and outlet chamber were constructed in reinforced concrete at the junctions of the pipe with the remaining portions of the supply flume. Two eight inch and one six inch steel pipe lines were installed to connect the new supply main to the trout rearing ponds. Two six inch drain lines were installed to control the ground water in the area of the main supply pipe.

The deteriorated flume was backfilled with gravel. Final finishing of the slopes and landscaping will be carried out next fiscal year.

# IVANHOE LAKE DAM, Ivanhoe Township, Sudbury District

Work was commenced on constructing a new dam at the outlet of Ivanhoe Lake to replace the old timber crib structure which was built in 1932 and was washed out in the spring of 1960.

The porous, unstable river bottom necessitated extensive use of steel sheet pile cut-off walls around and adjacent to the spillway portion of the dam. The spillway portion was designed in reinforced concrete and the wing walls in earth fill.



Winter work on Ivanhoe Lake Dam, in Ivanhoe Township, Sudbury district.

The dam will control a drainage area of 540 square miles and will be capable of discharging up to 12,000 cubic feet per second and will maintain a constant level in the lake for fire-fighting, tourist and fish and wildlife interests.

The work on steel sheet piling and on concreting the foundation and the sluiceways was completed this fiscal year. Construction of the wing walls and improvement of the outlet channel will be carried out next fiscal year.

# KAHSHE LAKE DAMS, Morrison Township, Muskoka District

The two concrete dams which control the water level of Kahshe Lake were deteriorated to the extent that partial reconstruction was necessary.

The crest overflow dam located in Grants Bay at the entrance to the South Kahshe river was completely reconstructed with reinforced concrete. The new dam is 20 feet long and 11 feet high. It has an eight inch steel pipe placed through the dam which maintains a constant flow of water during all seasons for farm, tourist camps and a concrete industry operating on the river.

The main dam located at the entrance to the North Kahshe river was partially reconstructed. A new reinforced concrete crest overflow wing wall, 113 feet long, was constructed during the winter. This wall

also protects the piers of the adjacent township bridge from undercutting. The sluiceway of the dam itself was refaced and new concrete ice brakers were added to the old piers. A rock ridge in front of the sluiceway was removed to improve the discharge of the dam. The work was completed March 23, 1962.

# KENOGAMISIS LAKE DAM, Houck Township, Thunder Bay District

The Department of Lands and Forests requested that a dam be constructed at the outlet of Kenogamisis Lake to establish a permanent water level in the lake and to provide for adequate discharge from the lake during the freshet and flood periods. A controlled lake level was essential for operation of the Lands and Forests Air Base, for propagation of fish and for recreational activities on the lake.

The new dam was constructed with reinforced concrete and earth fill. The total length of the dam including the wing walls is 190 feet. The dam is based on solid rock and has five 14-foot sluiceways fitted with timber stop logs. The head of water from the sluiceway sill to the regulated water level is seven feet and the deck of the dam is five feet above this level. The deck is 102 feet long, 12 feet wide and twelve inches thick. It is equipped with a pair of movable gear winches on steel rails for operation of the stop logs and with a steel pipe hand rail.

The project was completed September 23, 1961.

# LITTLE RAPIDS DAM, Thessalon Township, Algoma District

The westerly wing wall and one sluiceway of the dam were reconstructed with reinforced concrete in 1955. This year, work was carried out on reconstructing the remaining portion of the dam and the project was completed on November 13, 1961.

The dam rests on solid rock. It is 187 feet long and has two 14-foot sluiceways fitted with timber stop logs. The head of water measured from the sluiceway sill to the regulated water level is 13 feet and the top of the deck is three feet above this level. The deck of the dam is 40 feet long, 13 feet wide and 12 inches thick. Two pairs of stationary hand operated winches were placed on the deck for operation of the stop logs and steel pipe hand rail was placed around the deck and along the wing walls for safety of operation.

# FISHWAY AT NICOLSTON DAM, Essa Township, Simcoe County

The fishway in Nottawasaga river that was commenced last fiscal year, was completed and put in operation on April 19, 1961.

The total length of the structure is 100 feet. The five feet wide channel which connects the downstream river with the upstream reservoir is divided into 11 chambers for allowing the fish to surmount the total difference in water levels of approximately eight feet. A mechanically operated fish trap was installed for counting and tagging the migrating trout. Lighting was installed for night time operation. The area around the fishway was fenced and landscaped.

# TILDEN LAKE DAM, Lyman Township, Nipissing District

A new reinforced concrete dam was constructed at the outlet of Tilden lake to replace an old timber dam. The work was requested by the Department of Lands and Forests to control the water level in the lake.

The dam's total length, including the earth filled wing walls is 265 feet. It is based on a reinforced concrete foundation slab, 87 feet long, 25 feet six inches wide and two feet thick, which rests on an impervious layer of glacial till.

The foundation slab is formed in such a manner that it serves as a stilling basin. The dam has two 14-foot sluiceways fitted with timber stop logs. The head of water from the sluiceway sill to the regulated water level is eight feet and the deck of the dam is four feet six inches above this level. The deck is 40 feet long, 13 feet wide and twelve inches thick. It is equipped with two pairs of stationary hand operated winches for operation of the stop logs with a hand rail for safety of operation.

The project was completed October 28, 1961.

# LAKE TRAVERSE DAM, Edgar Township, Nipissing District

The reconstruction of the dam proper was completed last fiscal year to the extent that it could pass the freshet flow. This year, the rock filled wing walls were extended, the coffer dam was removed and the site was cleaned up.

The project was completed October 13, 1961.

# CURRENT REPAIRS AND MINOR CONSTRUCTION WORK

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work including

replacement of stop logs, overhauling of winches and the painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Ayers (Kearney) Dam, Parry Sound District; Lavielle Lake Dam, Nipissing District; Magnetawan Dams, Locks and Swing Bridge, Parry Sound District; Pickerel Lake Dam, Rainy River District; Port Sandfield Dock and Swing Bridge, Muskoka District; Ragged Lake Dam, Nipissing District.

#### General

Minor repairs, adjusting of winches, painting of steel parts, replacing of stop logs, etc., were made to 20 dams which are not listed above. Timber protection booms were repaired and replaced in front of 26 dams and 18 steel cable guard wires installed across channels upstream from dams for the safety and protection of careless boat operators. Driftwood and beaver dams were removed from 27 dams.

The construction equipment was overhauled and repaired and made ready for use in the ensuing season.

# (B) AIDS TO NAVIGATION

Two hundred and fifty floating buoys, 70 spar buoys and 14 rock signs were placed on the navigation routes in the areas of Lakes Muskoka, Rosseau and Joseph; 52 floating buoys were placed in Ahmic Lake, Lake Cecebe and the Magnetawan River; 55 floating buoys were placed in Lake Vernon, Peninsula and Fairy Lakes, the Muskoka River and Mary Lake.

Dredging was carried out for deepening of the river between Fairy Lake and Huntsville Dam and Lock.

## (C) LOCKAGES

The records of watercraft which were passed through the three locks operated by the Provincial Government were as follows:

Tooks operated by	Boats over 30ft. in	Small		
	length	Boats	Scows	Total
Port Carling	1,470	11,067		12,537
Huntsville		1,292	24	1,316
Magnetewan		522		522
				1.4.275
	1,470	12,881	24	14,375
			_	

#### (D) REMEDIAL WORKS

Grants totalling \$51,327.26 were paid to municipalities for flood relief, etc., in the following amounts: ESSEX: Maidstone Township \$1,000.03. KENT: Chatham, \$28,085.77; Harwich Township, \$2,100.00. PARRY SOUND: Chapman Township, \$242.25; South Himsworth Township, \$1,000.00 SUDBURY: Chelmsford, \$1,970.33. TEMIS-KAMING: Casey Township, \$16,928.88.

#### 2. DRAINAGE SECTION

## (A) PROVINCIAL AID TO DRAINAGE

Grants paid during the fiscal year 1961-62 to organized municipalities:

BRANT: Burford Township, 1 grant, \$1,756.93. BRUCE: Arran Township, 1 grant, \$1,612.43; Carrick Township, 3 grants, \$3,191.67; Huron Township, 4 grants, \$9,985.68; Kinloss Township, 1 grant, \$4.587.35. CARLETON: Richmond (Village), 1 grant, \$284.41; Osgoode Township, 1 grant \$1,222.76. DUFFERIN: Amaranth Township, 4 grants, \$3,240,27. DUNDAS: Mountain Township, 3 grants, \$5,109.98: Williamsburg Township, 2 grants, \$2,133.91; Winchester Township, 2 grants. \$2,180.32. ELGIN: Aldborough Township, 20 grants, \$24,259.96; Bayham Township, 2 grants, \$4,002.67; Dunwich Township, 9 grants, \$4,952.47; Southwold Township, 5 grants, \$15,385.70; Yarmouth Township, 1 grant, \$4,515.33. ESSEX: Anderdon Township, 11 grants, \$18,535.47; Colchester North, 2 grants, \$3,512.66; Colchester South, 3 grants, \$5,013.59; Gosfield North, 19 grants, \$9,431.90; Gosfield South, 7 grants, \$22,337.62; Maidstone Township, 8 grants, \$13,279.40; Malden Township, 1 grant, \$202.86; Mersea Township, 12 grants, \$16,805.07; Pelee Township, 2 grants, \$1,444.73; Sandwich East, 3 grants, \$1,631.62; Sandwich South, 1 grant, \$372.47; Tilbury North, 3 grants, \$1,340.71; Tilbury West, 5 grants, \$4,323.76. GRENVILLE: Oxford-on-Rideau, 1 grant, \$1,729.81. GREY: Derby Township, 1 grant, \$9,674.92; Normanby Township, 1 grant, \$785.82. HALDIMAND: Dunn Township, 1 grant, \$884.64; Moulton Township, 2 grants, \$2,414.90; Sherbrooke Township, 3 grants, \$2,864.57. HURON: Goderich, 2 grants, \$2,102.88; Grey Township, 2 grants, \$1,182.79; Hay Township, 1 grant, \$1,344.75; Howick Township, 5 grants, \$2,666.19; Hullett Township, 1 grant, \$1,198.49; McKillop Township, 3 grants, \$13,078.81; Morris Township, 1 grant, \$493.29; Stanley Township, 2 grants, \$1,649.58; Stephen Township, 2 grants, \$6,155.31; Tuckersmith Township, 1 grant, \$778.00; Usborne Township, 12 grants, \$10,118.28. KENT: Erie Beach (Village), 1 grant, \$237.69; Camden, 11 grants, \$6,639.23; Harwich, 21 grants, \$18,129.37; Howard, 8 grants, \$4,946.39; Orford, 5 grants,

\$2,920.44; Raleigh, 13 grants, \$6,883.78; Romney, 2 grants, \$2,023.66; Tilbury East, 10 grants, \$7,674.87; Zone Township, 3 grants, \$1,243.00. LAMBTON: Bosanquet Township, 10 grants, \$17,936.03; Brooke Township, 12 grants, \$9,901.35; Dawn Township, 7 grants, \$5,782.57; Enniskillen Township, 10 grants, \$18,038.20; Moore Township, 2 grants, \$1,168.22; Plympton Township, 12 grants, \$17,973.88; Sarnia, 1 grant, \$709.26; Sombra Township, 19 grants, \$20,717.78; Warwick Township, 13 grants, \$10,207.82. LANARK: Ramsay Township, 1 grant, \$736.67. MIDDLESEX: Newbury (Village), 1 grant, \$271.95; Biddulph Township, 5 grants, \$6,269.59; Caradoc Township, 5 grants, \$9,007.81; Delaware Township, 1 grant, \$324.63; East Williams Township, 6 grants, \$10,946.21; Ekfrid Township, 5 grants, \$7,687.59; London, 6 grants, \$5,704.82; McGillivray Township, 3 grants, \$9,546.05; Metcalfe Township, 3 grants, \$3,259.72; Mosa Township, 17 grants, \$8,955.95; North Dorchester, 1 grant, \$568.22; Westminster Township, 1 grant, \$1,486.75; West Nissouri, 1 grant, \$679.86. NORFOLK: Charlotteville Township, 5 grants, \$9,247.82; Houghton Township, 3 grants, \$3,619.77; Middleton Township, 4 grants, \$2,459.89; North Walsingham, 6 grants, \$5,468.35; South Walsingham, 2 grants, \$1,360.30; Townsend Township, 6 grants, \$2,347.36; Windham Township, 4 grants, \$5,818.07. OXFORD: Embro (Village), 1 grant, \$932.24; Dereham Township, 7 grants, \$11,589.24; East Nissouri, 3 grants, \$8,169.35; East Oxford, 7 grants, \$5,514.01; East Zorra, 1 grant, \$1,325.93; North Norwich, 6 grants, \$6,590.57. South Norwich, 3 grants, \$8,348.20. PERTH: Blanshard Township, 1 grant, \$2,455.45; Downie Township, 3 grants, \$2,730.73; Ellice Township, 7 grants, \$6,669.69; Elma Township, 1 grant, \$512.27; Fullarton Township, 4 grants, \$3,751.60; Hibbert Township, 3 grants, \$6,387.47; Logan Township, 3 grants, \$2,671.08; Mornington Township, 7 grants, \$9,792.80; North Easthope, 5 grants, \$4,613.65; South Easthope, 2 grants, \$1,285.14; Wallace Township, 3 grants, \$4,883.64. PRESCOTT: Alfred Township, 1 grant, \$1,770.46; Caledonia Township, 2 grants, \$2,848.47. RENFREW: Westmeath Township, 1 grant, \$1,697.69. RUSSELL: Cambridge Township, 2 grants, \$838.03; Cumberland Township, 1 grant, \$1,696.69. SIMCOE: Bradford (Town), 1 grant, \$1,402.70: Innisfil Township, 1 grant, \$601.13; West Gwillimbury, 4 grants, \$10,063.09. STORMONT: Cornwall Township, 3 grants, \$3,121.92. WATERLOO: Wellesley Township, 3 grants, \$5,321.48. WELLAND: Bertie Township, 1 grant, \$664.20; Humberstone Township, 1 grant, \$54.30; Wainfleet Township, 2 grants, \$1,614.91. WELLINGTON: Maryborough Township, 7 grants, \$9,466.77; Minto Township, 6 grants, \$6,817.09; Nichol Township, 1 grant, \$365.08; Peel Township, 1 grant, \$2,575.87; West Garafraxa, 2 grants, \$3,160.98. YORK: King Township, 2 grants, \$1,130.28. MANITOULIN DISTRICT: Carnarvon Township, 1 grant, \$11,559.07. RAINY RIVER DISTRICT: Worthington Township, 1 grant, \$327.67. TOTAL: 535 grants — \$649,998.59.

# FINANCIAL ASSISTANCE TO TERRITORIAL DISTRICTS Non-Municipal

The Provincial Aid to Drainage Act, 1954, provides for financial assistance up to 80 per cent of the cost of approved drainage works in unorganized Townships in Territorial Districts and Provisional Counties. The remaining 20 per cent of the cost is paid by the owners of the benefiting lands. Financial assistance under the provisions of the Provincial Aid to Drainage Act, 1954, amounted to \$8,331.62 on four drainage projects, as follows: PARRY SOUND: Pringle Township, \$1,849.90. COCHRANE: Lamarche Township, \$1,347.36. NIPISSING: MacPherson Township, \$677.56; MacPherson Township, \$4,456.80.

# (B) MUNICIPAL DRAINAGE Grants paid to Organized Municipalities

A grant of \$213 was paid in aid of Municipal Drainage in Laird Township, Algoma District.



New road and curbs at the Administration Building, Ontario Reformatory, Guelph.

## 3. ROADS SECTION

## Summary:

New construction, repair and improvement work on roads, parking areas, sidewalks, curbs, etc., involved an expenditure of \$372,000.

# DEPARTMENT OF AGRICULTURE Guelph, Ontario Agricultural College and Ontario Veterinary College

College Lane was widened and resurfaced. Resurfacing was also carried out near the poultry building and various sidewalks were constructed.

# DEPARTMENT OF THE ATTORNEY GENERAL

Driveways were paved at 22 detachment buildings and housing units throughout the province.

## DEPARTMENT OF EDUCATION

Parking lots or roads were paved at London, Stratford, and Toronto Teachers' Colleges.

## DEPARTMENT OF HEALTH

Parking lots or roads were paved, curbs and drains provided, etc., at the Ontario Hospital, Brockville; Ontario Hospital, Cedar Springs; Psychiatric Research Institute, Byron, (London); Ontario Hospital, Smith's Falls; Toronto Psychiatric Hospital; Ontario Hospital, Kingston; Ontario Hospital, Cobourg; Ontario Hospital, New Toronto; Ontario Hospital, Whitby; Toronto Alcoholic Research Foundation.

# DEPARTMENT OF PUBLIC WORKS

# McFarlane Lake, Ontario Government Buildings

Access roads, a driveway, and two parking areas to provide parking facilities for 22 cars were constructed.

# Mimico, Central Stores

Paving between central stores and the regional office was completed to eliminate dust conditions.

#### **DEPARTMENT OF REFORM INSTITUTIONS**

Various minor paving and roadwork was done at the Ontario Women's Guidance Centre, Ingleside; Training School for Girls, Galt; Ontario Reformatory, Guelph; Ontario Reformatory, Mimico; Girls' Training School, Port Bolster; and the Andrew Mercer Reformatory, Toronto

#### DEPARTMENT OF TRAVEL AND PUBLICITY

The parking area was resurfaced at the Tourist Reception Centre, Niagara Falls.

#### 4. LANDSCAPING SECTION

#### DEPARTMENT OF AGRICULTURE

A landscape contract was carried out, including grading and laying sod on the banks adjacent to the athletic field at the rear of the Physical Education Building at the Ontario Agricultural College, Guelph.

#### DEPARTMENT OF EDUCATION

A contract was completed, including grading, seeding, sodding and installing a tricycle tract at the Ontario School for the Blind, Brantford. The seeded area is for a proposed play field.

A contract was completed, establishing an athletic field by grading, seeding, gravelling and installing a cinder track at the Ontario Athletic Leadership Camp, Longford Mills. A soccer field was constructed by grading and seeding.

#### DEPARTMENT OF HEALTH

The steep banks on the east end of the new female wing were graded, terraces established and dry walls constructed at the Ontario Hospital, Brockville. The program calls for planting hedges along the top of terraces and sodding, which will be done next year.

Extensive grading, sodding, seeding and planting of trees was completed at the Ontario Hospital School, Cedar Springs.

A contract was carried out for grading and building up sodded areas in front of the Administration Building at the Ontario Hospital, Smiths Falls.

Extensive grading and sodding was completed around the new laundry building at the Ontario Hospital, 999 Queen Street West, Toronto.



View of the north side, before landscaping, at the Ontario Reformatory, Millbrook.



The same site following landscaping at the Ontario Reformatory, Millbrook.

#### DEPARTMENT OF HIGHWAYS

Extensive grading, terracing, sodding and seeding around the new Administration Building was completed by Department of Public Works forces at Downsview.

#### ONTARIO WATER RESOURCES COMMISSION

Grading, sodding and seeding around the new laboratory building at Islington was completed by Department of Public Works forces.

## DEPARTMENT OF REFORM INSTITUTIONS

A landscaping contract was completed, including extensive grading, establishing drainage ditches, sodding and seeding the property for erosion control at Millbrook.

#### General

There were a number of small landscaping jobs carried out throughout the Province with Department of Public Works forces, especially in the Metropolitan Toronto area, ranging in cost from \$500 to \$2,000, covering the supplying and planting of trees and shrubs around Government buildings, also sodding in some cases.

A great deal of sod along roadways and sidewalks at Queen's Park becomes damaged and killed by snow ploughing and application of salt. The brine is splashed up on the lawns by the traffic with the result that the grassed areas have to be renewed each spring.

The extent of landscaping work carried out by this Department was approximately \$135,000 for the year.

Respectfully submitted,

W. L. Rice, P.Eng.

W. Z. Rice

Chief of the Civil Engineering Division.

# REPORT OF THE CHIEF OF THE SANITARY ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31, 1962.

Mr. J. D. Millar, Deputy Minister, Department of Public Works.

All of the existing sanitary installations which consist of water-works systems, sanitary and storm sewers, sewage treatment plants, pumping stations, etc., at the various hospitals, schools and other institutions throughout the Province, were maintained in good operating condition during the past fiscal year.

At the Ontario Hospital, Gravenhurst, the waterworks booster pumping station was completely rehabilitated. The existing old elevated steel water tank, which was beyond repair, was removed and a new steel tank was fabricated and erected on the existing tower structure. A new standpipe was also provided together with a reinforced concrete valve chamber below the tank equipped with an altitude valve, heat exchanger and water level controls to automatically operate the domestic service pumps. Heating in winter was provided.

At the Ontario Hospital, Orillia, prior to the construction of the new laundry and trades buildings, major revisions and additions were made to the water distribution system, also to the sanitary and storm sewers since there were conflictions of these services with the new building locations. Included with this construction was the installation of a second eight-inch cast iron watermain from the waterworks pump house across Highway No. 11 to the existing hospital water distribution system. This was done to eliminate any possibility of an interruption of the water supply in the event of a break in either the original or the new main.

At the Ontario School for the Deaf, Belleville, extensive revisions and additions were made to the water distribution system in order to provide better fire protection. This work included the installation of a second water service from the city main on Palmer Street on the east side of the school.

At the Ryerson Institute of Technology, Toronto, the older buildings with the exception of the Administration Building, were demolished in order to provide for the erection of a new building. In view of this it was necessary to revamp many of the services within the building area for the construction period. The installation of the permanent services for the new building is now 30 per cent complete.

At the Horticultural Experiment Station, Vineland, the irrigation system was extended to provide irrigation to an additional sixty acres. Five concrete valve chambers were provided along the half mile long pipeline extension which serves as outlets for connections by aluminum pipe provided with the necessary spray nozzles.

At the Department of Travel and Publicity Information Centre, Point Edward, irrigation lines were installed to facilitate watering of the many flower beds in the spacious grounds.

During the past year seven elevated steel water tanks at various locations in the Province were cleaned and repainted. The tank at the Ontario Hospital, Thistletown, was dismantled. This tank was used formerly when the water supply came from the adjacent Humber River. The hospital now is supplied by the Township of Etobicoke.

Over the past twelve month period many new buildings were constructed, one of the larger ones being the Clinical Services Building at the Ontario Hospital, Port Arthur. In each case services were provided to suit the respective requirements.

Construction projects completed during the year were:

#### **DEPARTMENT OF AGRICULTURE**

At the Ontario Agricultural College, Guelph, rehabilitation and reconstruction of portions of the storm and sanitary sewers in the area at the rear of the main Administration Building was carried out. This work included the sewers in the vicinity of the Agricultural Engineering Building, workshop, Trent Institute and laundry.

# DEPARTMENT OF THE ATTORNEY GENERAL ONTARIO PROVINCIAL POLICE BUILDINGS

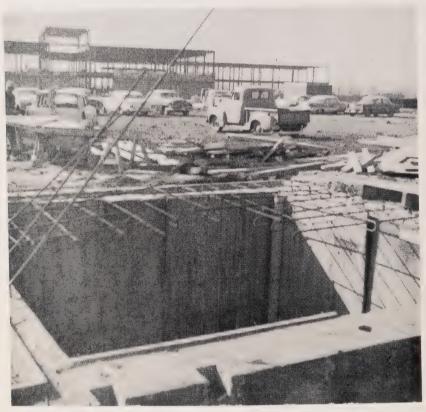
At Belleville a prefabricated steel, package sewage treatment plant of the extended aeration type, capable of treating 2,500 Imperial gallons per day has been provided and placed in operation. The effluent from this plant is chlorinated and is disposed of along with the storm water run-off in a storm sewer which discharges into a nearby creek.

#### FIRE MARSHAL

At the Ontario Fire College, Gravenhurst, the construction of an eight-inch cast iron pipe intake extending out into Lake Muskoka, a distance of 325 feet, has been completed. This intake conveys the water from the lake into the wet well below the existing water works pumphouse. Formerly the water supply was from springs, but due to the fact that the springs were a very considerable distance from the wet well, it became obvious that this water source had to be abandoned because of the excessive piping cost of same.

## DEPARTMENT OF EDUCATION

At the Ontario School for the Blind, Brantford, a 15-inch storm trunk sewer was constructed from the school area to a city storm sewer on Dufferin Street to provide adequate school drainage.



Progress of construction of the sewage disposal plant, Windsor Teachers' College.

The installation of the outside services was included in the general contract for the buildings at the Ontario School for the Deaf at Milton and this phase of the work has been completed. Water is supplied by the town from their eight-inch main on the west side of Ontario Street, which is across the street from the school property. This main feeds the system of mains, fire hydrants and services to the buildings of the school. A system of gravity sanitary sewers in the school area discharges into the town trunk sewer leading to the town treatment plant. The storm water drainage system which is now also completed discharges into a large ditch on Highway 25, which empties into an adjacent creek, provinding excellent drainage.

A new, total oxidation package type sewage treatment plant, providing chlorination of the effluent, has been constructed at the Windsor Teachers' College and is now in readiness to receive the college wastes when the fall term commences. This plant effluent, together with the storm water drainage from the college, has been connected into a 72-inch diameter municipal pipe drain. The water distribution system, the construction of which is included in the general contract, will be completed early in the summer.

#### DEPARTMENT OF HEALTH

Two timber groynes, projecting out into Lake Erie a distance of 100 feet from the shore, were constructed on either side of the waterworks low lift pumphouse at the Ontario Hospital, Cedar Springs. This work was found necessary in order to protect the pumphouse against storms and to prevent undercutting of the steep bank behind the pumphouse. This bank, which rises up at a very steep angle to a height of eighty feet above the lake, required maintenance because of erosion. To accomplish this, fill was placed, grading carried out followed by seeding and mulching. It was also found necessary to construct a gabion at either side of the concrete pumphouse.

The construction of a 12-inch cast iron water supply main located on the west side of Highway 21, from the town limits to the hospital, a distance of three miles, was completed at the Ontario Hospital, Goderich. This main supplies an elevated steel water tank of 250,000 Imperial gallon capacity, which, in turn, supplies the hospital through a system of mains on which fire hydrants are located. A gasoline engine driven fire pump has been provided to boost the pressure to meet fire fighting regulations. A system of gravity sanitary sewers has been constructed to carry all of the hospital sanitary wastes to a sewage lift station which will pump the sewage into the recently completed sewage lagoon.



Recently completed sewage lagoon serving the Ontario Hospital, Goderich.

Chlorination equipment has been provided so that any overflow from the lagoon will be chlorinated before being disposed of into the completed gravity storm water outfall sewer into Lake Huron. The construction of the system of gravity storm water sewers has also been completed.

The complete rehabilitation of the waterworks booster pumping station was completed with only two minor interruptions to service at the Gravenhurst Ontario Hospital. This involved the supply and installation of a new domestic water service pump and the renewal of all the piping. The contract for the removal and replacement of the elevated steel water tank and standpipe was completed. The new tank was fabricated on the existing steel tower which was cleaned and repainted. The contract also included the construction of a concrete valve chamber below the tank in which was provided an altitude valve and heat exhanger: water level controls were also provided to automatically operate the domestic water service pumps.

At the Ontario Hospital, Owen Sound, the construction of the system of gravity sanitary sewers, which will collect and transport all of the hospital sanitary wastes to a sewage pumping station, located at the west end of the hospital property, has been completed. The sewage lift station is fifty per cent completed. The installation of the six-inch cast iron sewage force main from the pumping station and terminating at the City of Owen Sound manhole, at the head end of the Eighth Street East sewer, is completed. The construction of the storm sewerage system to serve the hospital area has also been completed.

The water distribution system in the hospital area, including the installation of fire hydrants and services to the various buildings, has been completed by the contractor. The construction of the eight-inch cast iron water supply main from the city system at Eighth Street East city limits to the hospital system was carried out simultaneously.

An eight-inch cast iron water main extension from the hospital system to the farm area has been provided at the St. Thomas Ontario Hospital. This will provide adequate fire flow for the protection of all the farm buildings which was formerly inadequately provided by a well and an elevated wood stave tank. This tank, now no longer required, will be dismantled in the near future.

#### DEPARTMENT OF LANDS AND FORESTS

In order to provide sanitary services for the new Chief Ranger's Headquarters building and the existing pilot's residences at the Parry Sound Chief Ranger's Headquarters and Air Base, an agreement was entered into by this department and the town to extend their six-inch water main and eight-inch sanitary sewer westerly along Bay Street to the Lands and Forests property. The construction of a sewage lift station and the necessary gravity sewers on the station is under way and this contract is presently seventy per cent completed.

#### DEPARTMENT OF REFORM INSTITUTIONS

At the Industrial Farm, Burtch, a six-inch cast iron water main extension, 1,270 feet in length, was constructed to the new cattle barn to provide domestic water and fire protection.

At the Ontario Reformatory, Guelph, a six-inch cast iron water main was installed from the alternate water supply system, with source in the lake, to the cannery. This is to provide a large quantity of water daily for washing in the cannery process which was formerly supplied from the main water supply system which is from deep wells and springs. Other means are also being taken to conserve the water supply from the wells and springs since they are gradually failing.

At the Girls' Training School and Ontario Government Buildings, Lindsay, construction was begun in January 1961 of the trunk sanitary sewer commencing from a point on Highway 7B immediately in front of the Ontario Government Building, thence westerly along the

highway and turning north just east of the Girls' Training School and continuing on through the recently annexed portion of the Township of Ops to the town sewage treatment plant. This sewer is now completed and serves the Girls' Training School, the Ontario Government Building. the adjacent Ontario Provincial Police Detachment, and will in future serve the area of the town through which it passes. The contract for this construction was let and supervised by the Town of Lindsay. However, the work was carried out as per an agreement between the town and the Department of Public Works, both parties contributing to the cost according to the agreement. The construction of this sewer has enabled this department to eliminate the package sewage treatment plant formerly used to serve the Government Building. It will be removed during the summer and placed in operation at the Southern Research station, Maple. Further, the construction of this sewer has eliminated the necessity of providing and operating a separate sewage treatment plant to serve the Girls' Training School.

A new, modern, rated aeration type of sewage treatment plant, having a capacity of 50,000 Imperial gallons per day, has been constructed and placed in operation at the Monteith Industrial Farm. The plant effluent is chlorinated and is discharged into the adjacent river. This contract also included the rehabilitation of the system of sanitary sewers, the provision of new waterworks chlorination equipment with an automatic control system on the elevated steel water tank and certain enlargements and extensions to the water distribution system.

Under an agreement between the Town of Simcoe and the Department of Public Works for the Boys' Training School at Simcoe, the town will supply water to the school and they will receive and treat the school sanitary wastes in their existing sewage treatment plant. To this end the town has completed an extension to their water main on Victoria Street, eastward from the town limits to Roxborough Corners, thence southerly along the sideroad to the school. They have also completed the construction of the necessary extension of their existing gravity sewer easterly along Victoria Street from the town limits to Roxborough Corners. A sewage lift station has been constructed at the north east corner of the school property and a cast iron force main has been installed from the lift station along the sideroad to Roxborough Corners and discharges into the new manhole at this point. The construction by contract of the outside services within the school property, i.e. sanitary sewers, storm sewers and water distribution system, has also been completed.

#### ONTARIO WATER RESOURCES COMMISSION

The construction of an independent water supply system with source in the adjacent Humber River capable of supplying 100 Imperial gallons per minute, was completed at the Laboratories Research Building, Toronto. This consists of a six-inch cast iron intake, a concrete wet well with pumphouse above same, containing pumping equipment, also a four-inch force main to the building. This installation is functioning well and is used for carrying out research on filters, filter media, as well as other uses.

Designs were made, working drawings completed and specifications prepared for the following works contracts which are to be carried out during the new fiscal year:

#### ONTARIO GOVERNMENT BRANCH OFFICE BUILDINGS

A contract will be let during the summer for the installation at Red Lake of a prefabricated steel package sewage treatment plant of the total oxidation type capable of treating 2,500 Imperial gallons per day. This plant will be located on the opposite side of Howey Street, adjacent to Red Lake. The chlorinated plant effluent will be discharged into the lake. The existing storm sewer and water supply line crossing Howey Street which, in the past, have caused interruption of services due to freezing, have been redesigned and will be relaid together with the new sanitary influent sewer to the plant, in such a manner as to be trouble free in the future.

#### DEPARTMENT OF AGRICULTURE

Detailed working drawings were completed for the installation, at the Ontario Agricultural College, Guelph, of an eight-inch cast iron watermain on the street at the rear of the main administration building from College Avenue to College Lane. This main will connect to the respective existing mains on College Avenue and College Lane and will complete the eight-inch watermain loop around the colleges. This will permit the elimination of the old existing six-inch watermain, two sections of which are located under the two wings of the administration building, and which is inadequate for present fire protection requirements.

Tenders are to be called early in the summer for an extension to the water distribution system at the Arkell Farm. This extension will provide for the installation of 725 lineal feet of six-inch cast iron watermain with two fire hydrants. This contract will also provide domestic services to the two barns, turkey houses, new implement shed and sheep shed which is presently under construction.

#### DEPARTMENT OF HEALTH

Tenders will be called early in the summer for the construction of a new system of sanitary sewers at the Psychiatric Research Institute for Children at Byron, which will include a sewage pumping station to serve a few buildings in a lower area of the grounds. Also included will be a gravity trunk sewer to convey all the Institute sewage to the Sifton Sewage Treatment Plant. The sewage will be received and treated in this plant under an agreement which has been drawn up between the Department, the Sifton Construction Company and the City of London. This area has recently been annexed by the city. Included in the same contract will be the necessary additions and revisions to the water distribution system which will include a second service of eight-inch diameter taken from the 12-inch city watermain on the Sanitarium Sideroad.

At the Ontario Hospital, Hamilton, a contract will be called which will include the construction of a second eight-inch cast iron water service off the city 12-inch watermain on Fennell Avenue and the installation of this main over to the existing underground concrete water reservoir, together with an inter-connection to the existing hospital water distribution system. The second water service will provide additional fire flow in the event of fire and at the same time will eliminate any possibility of interruption of the water supply to the hospital.

Working drawings and specifications were prepared for the calling of tenders for the construction of a sanitary sewage pumping station with a six-inch cast iron force main, 2,500 feet in length, at the Ontario Hospital, Whitby. This lift station will replace the existing one which is very old and inadequate. The new station will, in addition to serving the same area of the hospital, also serve the new School of Nursing presently under construction. Included in this contract will also be the installation of a barminutor at the sewage treatment plant which will further improve the efficiency of the plant.

#### DEPARTMENT OF LANDS AND FORESTS

Tenders will be called about mid-summer at the Dorset Forest Ranger School for the construction of a complete new sewerage system to serve the whole school, also a proposed large dormitory building which will be built in the near future. The new works will consist of a system of gravity sewers, a small sewage lift station, a total oxidation sewage treatment plant capable of serving a population of 250 with an outfall sewer extending out into Lake St. Nora a distance of 700 feet, at

which point the lake is sixty feet in depth. The sewage effluent from the treatment plant will be chlorinated.

A new waterworks system consisting of a 12-inch cast iron intake pipe into Abram Lake a distance of 250 feet, to convey the water into a large concrete wet well on shore, will be built this year for the Chief Ranger's Headquarters at Sioux Lookout. The pump house will be constructed over the wet well and will house the electrically driven domestic service pumps, the gasoline engine driven fire pump, the 500 Imperial gallon hydro-pneumatic pressure tank and chlorination equipment, etc. Five thousand lineal feet of six-inch and eight-inch cast iron pipes will be employed to serve all the residences and buildings which extend over a large area. Twelve fire hydrants will be provided to assure adequate fire protection which at present does not exist. A new domestic water service of adequate size will be installed from the new system of mains to each building.

Plans and specifications are ready for an underground irrigation system to serve an area of 400 acres at the Swastika Tree Nursery. The installation will comprise 7,500 lineal feet of eight-inch asbestos cement pipe and eleven outlet manholes to provide for connections of aluminum pipe which will be carried over land. The existing portable irrigation system employed is inadequate for this expanding nursery.

Tenders will be called early in the summer for the construction of a sanitary sewage system which will serve all the buildings of the Southern Research Station at Maple. The work will be made up of a system of gravity sewers and a sewage treatment plant, the effluent of which will be chlorinated and discharged into the Little Don River which flows through this station. The sewage treatment plant will be a prefabricated steel unit of the extended aeration type and capable of treating 7,500 Imperial gallons per day. This plant is now at the Ontario Government Building in Lindsay but is no longer required there.

During the year, at various locations throughout the Province, 43 deep wells were drilled: of these 32 were successful, were developed and brought into production. Twenty-nine of these wells were of medium capacity, i.e. with a production of from seven to 45 Imperial gallons per minute: the other three wells each had a production in excess of 100 Imperial gallons per minute. In each of the medium capacity wells, except in locations where the building to be supplied was not constructed, a suitable automatic pressure system was supplied and installed. In the case of each of the three larger wells a suitable turbine type deep well pump was purchased, installed and placed in service.

A complete site survey was carried out from which a site plan was prepared showing all buildings, roads, walks, fences, manholes, fire hydrants, etc., and all underground services at the following locations:

Ontario Government Building, Red Lake
Fish Hatchery, Glenora
Ranger School, Dorset
Southern Research Station, Maple
Chief Ranger Headquarters and Air Base, Sioux Lookout
Ontario Agricultural College, Guelph (70 per cent complete).

Respectfully submitted,

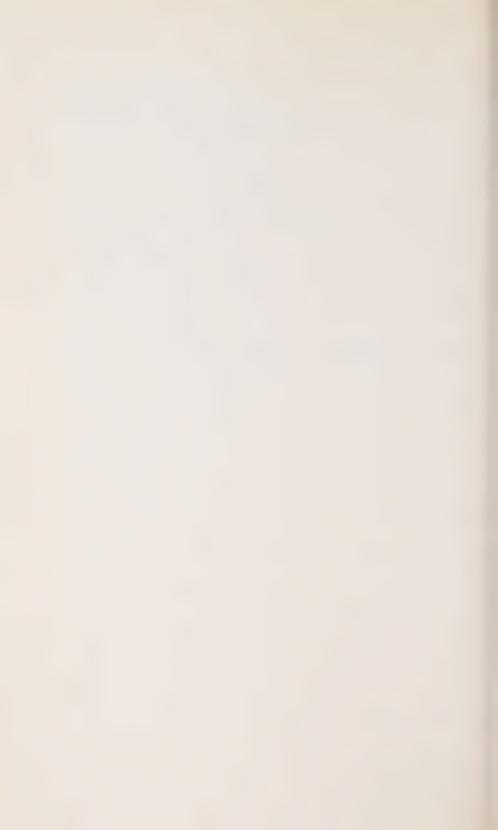
H. E. Bushlen, P. Eng.

Chief of the Sanitary Engineering Division.

HE Bushlew.

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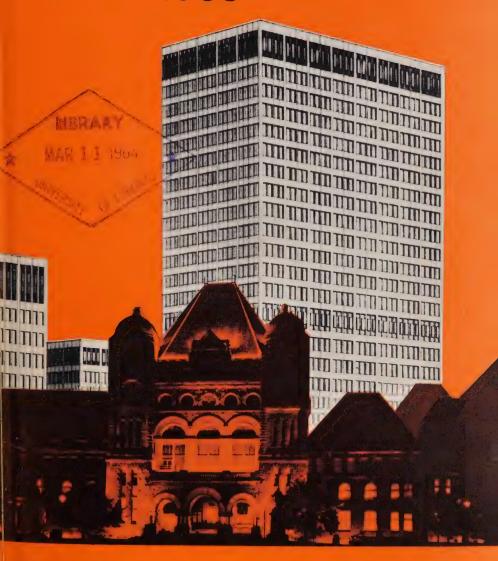








# Department of Public Works Annual Report 1963









## Report of the Minister of Public Works

**Province of Ontario** 

For the Year Ending March 31, 1963



ONTARIC

Printed by order of the Legislative Assembly of Ontario

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Toronto, Canada



THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE J. KEILLER MACKAY, D.S.O., V.D., LL.D., Lieutenant-Governor of the Province of Ontario.

#### YOUR HONOUR:

The undersigned has the privilege of submitting for the information of Your Honour and the Legislative Assembly, the Annual Report of the works under the control of the Public Works Department, comprising the report of the Deputy Minister, for the 12 months ending the 31st of March, 1963.

MINISTER OF PUBLIC WORKS

Department of Public Works, Toronto, March 31, 1963. THE HONOURABLE RAY CONNELL. Minister of Public Works. Parliament Buildings. Toronto, Ontario.

SIR:

With all respect I submit to you my General Summary together with the reports of the Chiefs of the Architects' Branch, the Property Branch, the Accounts Branch, the Civil Engineering Division and the Sanitary Engineering Division, for the fiscal year April 1, 1962, to March 31, 1963.

I desire at this time to express my sincere thanks and appreciation to you for your kindliness and patience when dealing with all matters pertaining to departmental administration. I also want to thank the members of the Department of Public Works for their continued co-operation and assistance in carrying out another large construction program.

I have the honour to be, Sir, Your obedient servant,

J. D. Wills. DEPUTY MINISTER OF PUBLIC WORKS.

Toronto, March 31, 1963.

#### Summary by the Deputy Minister

Planning was again the watchword of the Ontario Department of Public Works during the fiscal year 1962-63. Far and away the largest project on the planning boards was the Queen's Park office expansion program, but there was also extensive planning done on major works in all parts of the province.

At the conclusion of the previous fiscal year, the architectural staff of the department had brought the Queen's Park project to the stage where associate architects could be appointed to carry on the detail work. To this end, a new firm was established called Associated Architects for Queen's Park project. This firm was composed of staff from four of Toronto's leading architectural firms — Allward & Gouinlock, Gordon S. Adamson & Associates, Mathers & Haldenby and Shore and Moffat. Consulting engineering firms retained were: H. Angus and Associates, for mechanical engineering; C. D. Carruthers and Wallace Consultants Ltd., on structural engineering, and R. P. Allsop and Associates, on electrical engineering.

These firms have worked steadily during the past year, in consultation with our own architectural and engineering staff, to solve the myriad of problems that a huge project of this scope involves.

Among the major problems was the supply of heat and power for the nearly one million square feet of space that will be provided. While it had earlier been thought that a new powerhouse would have to be included in the structures planned for the blocks bound by Surrey Place, Wellesley, Bay and Grosvenor Sts., it was found that with the conversion of the present boilers in the East Block from coal to natural gas with oil standby, this powerhouse could be eliminated. This represents a substantial saving both in construction and operating costs.

While the Department has always tried to be a leader in safety practices both in construction and in the operation of our vehicle fleet, an intensified Construction Safety Program was started last year. The first step included the distribution of safety literature and conducting a safety promotional program with emphasis in hard hats on all jobs. Operators of machinery were checked out and operators' permits issued. St. John Ambulance first aid courses were conducted on a province-wide basis and 180 staff members were graduated with a Senior First Aid Certificate. Construction safety courses have been given to more than 150 supervisory personnel.

The safe driving program, instituted in 1957 in the Department, has continued to bear fruit. Before this program was started, the department had 68 units on the road and accident damages in one year amounted to \$7,800. Last year, the 118 units drove approximately 1,500,000 miles and accident damage cost dropped to \$153 in 1962.

#### Report of the Chief of the Architects' Branch

MR. J. D. MILLAR. Deputy Minister of Public Works. Parliament Buildings, Toronto, Ontario,

DEAR SIR:

I have the honour to report on the work accomplished by the Architects' Branch of the Department of Public Works, Ontario, during the fiscal year April 1, 1962, to March 31, 1963.

During this period, some \$207,000,000 worth of building projects were either under construction or planning. Of this sum, \$170,000,000 was under construction including items for which approval had been given for construction such as the new Oueen's Park Plan.

For the Department of Health, the new Ontario Hospital, Goderich, was completed, Ontario Hospital, Owen Sound, was nearly finished and work is nearing completion on the first stage of Ontario Hospital, Palmerston. Other large works were developed for this department which will be referred to in more detail in the following report. A number of detachment buildings for the Ontario Provincial Police were under construction and two Registry Office buildings were built.

Considerable construction was undertaken for Highways. Thirty-three patrol garages, ranging from three to 11 bays, were in various stages of development and final work was done on a district repair garage. Education received the new Northern Ontario Institute of Technology at Kirkland Lake and a new Teachers' College at Windsor, while work was essentially completed on first-stage developments of the new School for the Deaf at Milton and a new unit for Ryerson Institute of Technology. For Reform Institutions, two new training schools - one for girls at Lindsay and one for boys at Simcoe — were finished.

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

Renovations, alterations, partition and redecoration work were carried out for many departments in the Parliament Buildings.

In the Main Building, the Savings Office was extended to provide a manager's office and teller's cage.

In the North Wing, an exhaust ventilating system was installed in 20 vaults in the basement, first and second floors.

In the East Block, extensive work was completed on three boilers. A combination gas-oil burner with necessary controls was installed as well as oil storage tanks, pumps, piping, etc; also a combustion air and ventilation arrangement to reduce smoke problems and increase steam generation by 50 per cent. The seventh floor switchboard room was renovated for the direct-inward dialing installation to serve the Provincial Government.

Routine maintenance, alterations and renovation work were carried out in all Metro locations, as necessary.

Demolition of various properties in the Queen's Park area was advanced in preparation for future building. St. Joseph's Convent was completely demolished with the exception of the boiler room building which is still in use. The houses on 12 properties — 55 to 77 Breadalbane Street West — were also demolished. The Athelma Apartments at the corner of Surrey Place and Grosvenor Street were razed and the area temporarily leased as a car-park.

#### DEPARTMENT OF PUBLIC WORKS REGIONAL BUILDINGS

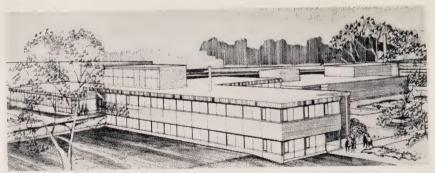
At Sudbury (McFarlane Lake), work completed included new access roads, a parking area, and provision of additional roadway lighting. Huntsville was provided with a cement block workshop building and a stores office with washroom facilities in the main building in addition to general maintenance work.

## For The Department of Agriculture

Expansion of building facilities at the Federated Colleges at Guelph continued with two contracts during the year. Tender call was out in March, 1963, for a Poultry, Pathology and Virology building estimated at about \$1,300,000 for the O.V.C., and tender will shortly be called for a Chemistry and Microbiology building to add to the Science Buildings Group, valued at over \$3,000,000 to serve both the O.V.C. and O.A.C.



Perspective of proposed Chemistry and Microbiology building, O.A.C., Guelph



Perspective of proposed Poultry, Pathology and Virology building, O.V.C., Guelph.

Of the contracts, a \$92,363 contract was awarded to Len Ariss & Company Ltd. of Guelph in April 1962 for the construction of a pathogen-free pig unit for the Veterinary College. This project was carried forward to near completion in two sections on a site near the new Medical-Surgical building. The first section consists of a 53 by 26-foot addition to the holding pens featuring the operating room; the second comprises a 98 by 26-foot incubation building. The buildings will be used for experimental purposes to improve the breeding of pigs. The principle involved would prevent the piglet from having any contact with the mother sow from birth on. Piglets will be born in germ-free plastic-type balloons by Caesarian method and nurtured in incubation rooms during their early life. The purpose of the new unit is an attempt to prevent the development of rhinitis (distortion of the jaw) and tuberculosis in newborn piglets.

A \$171,000 contract was awarded in November 1962 to A. Battaglia Construction Company Ltd., Guelph contracting firm, for the construction of a Breeders' Service building. This is a single storey brick and concrete building with full basement measuring 125 by 53 feet. General accommodation will include a receiving and shipping platform, storage and freezing areas, production section, cold rooms, research laboratory and offices. Facilities will provide for research into animal breeding problems including such matters as receiving and processing, storage and re-issue of semen from registered pure bred animals, as required, and the keeping of records of such animals. The building is being built by the Department of Public Works but the cost will be defrayed by the Ontario Artificial Breeders' Association. The project is 35 per cent finished.

A considerable amount of other work was done at this college. All interior work was completed at the new 220 by 50-foot Horticultural Storage building; renovation work at MacDonald Hall and the Old Biology Building is finished; renovation at the Apiculture Building to convert classrooms into laboratories

is done and extensive work on extension of the eight-inch watermains completed. At the O.V.C. sector, renovations to the Pathological and Bacteriological buildings are essentially completed with construction of a building for the storage of flammable material finished.

At Kemptville Agricultural School, a contract for construction of a new powerhouse was awarded in May 1962 to Angus L. MacDonald Construction Ltd. of Cornwall. The award was for \$286,000. The new powerhouse will be a one-storey structure with foundation walls of concrete, concrete block interior, brick exterior, and steel frame construction. The roof will be a concrete built-up roof supported on massolin joists and a 100-foot radial stack. It contains an engineer's office, workshop, storage, washroom with showers and generator room for electrical services. The boiler room will be equipped with two boilers with space available for a third in the event of expanded services. The power-house is substantially finished.

Construction of a new farm implement storage shed was started the latter part of 1961 at Simcoe Horticultural Experiment Sub-Station and the job was finished in September 1962. Facilities include a garage and workshop. A six-foot watchman fence was erected around the property.

The project to extend and complete the fire alarm system at New Liskeard Demonstration Farm was completed during the year; the roadway was paved and bathroom facilities at North House renovated.

## For The Department of the Attorney General

#### ONTARIO PROVINCIAL POLICE BUILDINGS

Six contracts totalling \$627,328 for the erection of Ontario police detachment buildings in various sections of the province were awarded during the year.

On October 16, 1962, a \$106,194 contract was awarded to the Stephen Construction Company Ltd. of Port Arthur for a Type "B" detachment building at Atikokan. The project is about 90 per cent done with the building being erected in a new development area in Atikoken about one-and-a-half miles east of the C.N.R. station. This is a single storey 167 by 34-foot structure with partial basement divided into administrative and living quarter areas. The 75 by 34-foot administration section contains a large general office, offices for the senior constable and radio operators, a magistrate's room with private washroom, a courtroom, male and female cells and public washrooms. Living quarters comprise a six-room apartment for the senior constable. Also included in the project are garages and a paved entrance and parking area.



The new O.P.P. detachment building, Atikokan.

A \$122,570 contract was awarded to Bergman and Nelson, Kenora, on October 16, 1962, to build a new detachment building at Emo. The building is about 90 per cent finished. It is located south of Highway 71, in Emo, and is similar in design, size and construction to that at Atikokan.

Dennis Charbonneau, Kapuskasing, was awarded a \$133,186 contract in October 1962 to build a detachment building at the junction of Caron St., facing on Highway No. 11, about three miles east of Kapuskasing. This building is almost identical to those at Atikokan and Emo. The job includes a four-car garage. At the end of the fiscal year construction had advanced to 75 per cent.

Substantially completed was a detachment building at Manitouwadge which is located just east of the Manitouwadge Hospital on Manitou Second-



View showing substantial completion of the new detachment building, Emo.



Early construction of the new detachment building, Powassan.

ary Highway 614, about 40 miles north of Highway 17. The contract for this police building went to Hacquoil Construction Ltd. of Fort William at \$82,758. It is smaller than the three detachments previously mentioned, being 122 by 25 feet. Construction is of concrete and red facing brick with roof of asphalt shingles. It consists of a partial basement and first floor divided into a six- room apartment and administrative areas. The job includes a two-car garage.

In November, 1962, a \$105,670 general trades contract was awarded to F. A. Gomoll and Sons Ltd. of Powassan to build a detachment building and four-car garage at the corner of Highway No. 11 and Clarke St. in Powassan. Construction started in December and at the end of the fiscal period it was about 25 per cent completed. The new police building is the same size as those at Atikokan, Emo and Kapuskasing.

Another new detachment building is being erected on a site about 10 miles north of Wallaceburg on the east side of Highway 40, south of Sombra. Construction is being done by Bert Wesley, Port Lambton building contractor, who received a \$76,950 contract on September 26, 1962. The building will be about 113 by 51 feet and divided into the usual administrative and living quarters sections. The administrative side will contain a large office, male and female cells, vault and washroom facilities. Included in the project is a three-car garage.

The former R.C.A.F. Air Station, located northeast of Aylmer, was acquired in July 1962 for use as an Ontario Police College. The site consists of 555.41 acres on Lots 15, 16, 17, 18 and 19 in the Township of Malahide and when acquired by the government consisted of five hangars and 14 other buildings. Extensive renovation, alteration and mechanical work was done to suit the requirements of the Police College.

Preliminary work for the construction of a two-storey and basement headquarters and detachment building at Timmins was undertaken in August. A survey and contours were taken, soil tests carried out and sketch drawings prepared for this proposed building.

A retaining wall to correct erosion was completed for the Murray Mine transmitter building; a two-car garage was constructed for Kakabeka Falls; two single-car garages were built for housing units at Dryden; all work was finished on the new transmitter building at Sault Ste. Marie and a new sewage disposal system supplied to the Britt (Still River) detachment building. Tenders were called on March 26, 1963, for a new O.P.P. detachment building at Wawa estimated at \$140,000.

Routine paving and sodding operations, renovation, alterations and general maintenance were carried forward at many other locations.

#### COURTHOUSES AND REGISTRY OFFICES

New Registry Office buildings at Kenora and Parry Sound were completed. The Kenora job, contracted to Bergman & Nelson Company Ltd., Kenora, for \$120,602 was provisionally accepted by the Department of Public Works on February 13, 1963. The new Registry Office at Parry Sound was finished in October 1962. It was built by Konvey Construction Company Ltd. of Kingston at a contract price of \$142,064 on government property located on Miller St. at the rear of the existing Courthouse and Registry Offices.

Substantial renovation and alteration work at the Sault Ste. Marie Courthouse was carried forward and routine maintenance and renovations carried out at other locations.



The new Registry Office building, Parry Sound.



The new Registry Office building, Kenora.



Section of the office, new Registry Office building, Kenora.



Advanced construction progress of the new Teachers' College, Windsor.

## For The Department of Education

Major new works totalling \$10,722,989 in contracts and comprising a teachers' college, two new institutes of technology and a school for the deaf were completed, or nearing completion, during this period and a new vocational school for the Ontario School for the Deaf at Belleville, priced at \$538,700, was under way. Planning was well advanced for new trades schools at London and Ottawa and an institute of technology at Ottawa with a total estimate of an additional \$10,000,000.

The new Northern Ontario Institute of Technology at Kirkland Lake was turned over to the Department of Education on February 20, 1963. It was built by Betteridge Smith Construction Co. of Noranda, Que., on a \$245,989 contract. It is located off Highway No. 66 at Burnside Drive in Kirkland Lake. It is a 216 by 60-foot structure, single storey, with steel frame on a concrete foundation having no basement. It has exposed block masonry, interior par-



Wing of Windsor Teachers' College.

titions and steel sash, single glazed. The project includes an asphalt parking lot. Contained in the building are seven classrooms for the instruction of chemistry, physics, electrical and electronic sciences. It also includes preparation rooms, a students' common room, lecture room and staff offices. It is heated by its own heating plant.

The new teachers' college at Windsor was essentially completed in September 1962 and the Department of Education received full occupation at the end of October. The contract for its construction was awarded on July 25, 1961, to Ascon Construction Company Ltd. of Windsor for \$990,000. It was erected on a large site at Bruce Ave. and the Third Concession Road in Sandwich Township West. It is a two-storey "L" shaped structure of steel frame with brick walls, wood sash and metal ventilators. Facilities include 12 classrooms including industrial arts, home economics, art, science and social studies. Provision for six more classrooms has been made.

First-stage construction of the new Ontario School for the Deaf at Milton was completed. Contractors for this job comprising the junior school, staff residence, hospital, administration, laundry and boiler plant buildings, were Frid Construction Company Ltd. of Hamilton, who received a \$3,817,000 contract award for the work on September 12,1961. A full description of this project appeared in the previous Annual Report. Marani, Morris & Allan, Toronto, were associate architects for this project.

Overall construction of Unit No. 3 of the new building group at Toronto's Ryerson Institute of Technology was 97 per cent on March 31, 1963. Construction of this new building group began on August 14, 1961, when a \$5,670,000 general trades contract was awarded to Perini Construction Ltd. of Toronto. A description of this new project was detailed in the previous Annual Report. Unit No. 2 — the East Wing facing Church St. and running about 175 feet along Gerrard and Gould Sts., was completed in 1959. There is still a considerable amount of work to be done by the various trades to complete the



The Northern Ontario Institute of Technology, Kirkland Lake.

#### Ontario School for the Deaf, Milton



Aerial View.



Junior School.



Administration building.



The Hospital.

#### Ontario School for the Deaf, Milton



Staff Residence.



Power House.



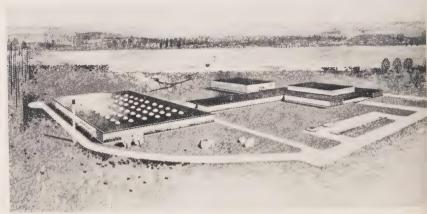
The Laundry building.



Perspective of the proposed Provincial Institute of Trades, London.



Perspective of the proposed Provincial Institute of Trades, Ottawa.



Perspective of the proposed Eastern Ontario Institute of Technology, Ottawa.



Construction progress of the new Vocational School, Ontario School for the Deaf, Belleville.

interior, including the balance of the ventilating system. Installation of kitchen equipment is under way.

A \$538,700 contract for the construction of a new vocational school building at the Ontario School for the Deaf, Belleville, was awarded on December 4, 1962, to T. A. Andre & Sons Ltd., Kingston contractors. The building is being located north of the main school building and east of the powerhouse and laundry buildings. It will be a single storey structure of steel, reinforced concrete and brick construction, 210 by 197 feet.

The new building will accommodate a number of offices and general class-rooms; training shops for occupational therapy; carpentry, millwork and cabinet work; upholstery and furniture finishing; printing and metal trades; auto body work, service station and auto painting; drafting and blueprinting rooms, library, teachers' lounge, lobby and waiting room. Heating will be supplied from the adjacent powerhouse. Construction had progressed to about 10 per cent at the end of March.

A building at 37 Dartnell Ave., Toronto, has been completely renovated and occupied by the Department of Education to serve as a Provincial Institute of Trades. It stands three storeys with full basement and is 100 by 120 feet. The building is of solid brick construction with floors, columns and beams of reinforced concrete construction. Courses given are mainly for the unemployed and include small appliance, electric motor, typewriter service and repair instruction. Two rooms on the third floor are devoted solely to a Marine Radar Simulator course with all the necessary radar equipment installed to instruct captains of Great Lakes vessels and sea going vessels in the

## Ryerson Polytechnical Institute



Main Entrance, Gould Street, showing statue of Egerton Ryerson.



The Cafeteria.



The 1,500 seat Auditorium.



The Gymnasium, Ryerson Polytechnical Institute, Toronto.

uses of radar detection. At present, this is the only instructional course of its kind in Canada.

The building at 15 Breadalbane St. in Toronto, which was formerly used as a Department of Public Works shop and also as a license issuing center for the Department of Transport, and has been undergoing extensive renovation to serve as a trades school for the Department of Education, is now completed and fully occupied. Courses in auto body repair, paint spraying and diesel engine repair are taught.

The former Toronto Hydro Garage at 25 Wellesley St. West, Toronto, was acquired in August 1961 and has undergone extensive renovation to serve as a trades school. The building is now complete and fully occupied. Courses are taught in automotive mechanics and small engine repair.

Renovation of the fourth floor of Building No. 3, Provincial Institute of Trades, 21 Nassau St., Toronto, is in progress to provide a new cafeteria and dining area and to combine in this installation a cooking or chef's school. The project is about 20 per cent completed.

General maintenance and renovation was carried forward at other educational centres.

# For The Department of Health

New construction for mental hospitals amounting to over \$13,000,000 was either completed or substantially finished at the end of the fiscal year.

Official opening ceremonies for the new Ontario Hospital at Goderich were held on January 16, 1963, when the key to the buildings was presented by Hon. Ray Connell, Minister of Public Works, to Hon. Matthew B. Dymond, Minister of Health, following which Prime Minister John P. Robarts unveiled a commemorative plaque. Construction of this project began in November 1960 at a site about two-and-a-half miles south of Goderich on No. 21 Highway. Anglin-Norcross Company Ltd., Toronto, erected the building at a contract price of \$3,505,506. The project consisted of a series of single-storey cottages joined to two-storey administrative and service wings with a bed accommodation of 300.

Tenders were called for a second 300-bed mental hospital at Owen Sound on April 5, 1961, and a general trades contract for the project awarded to Ellis-Don Ltd., London contractors, in May for \$3,030,728. Like Goderich, this hospital is a complete departure from the old style institutional type. Traditional long corridors are eliminated. Single-storey cottages and two-storey wings with a minimum of restriction for patients are featured throughout. Interior decor emphasizes domestic pastel shades and extensive use of glass. Ample day rooms and recreational facilities create a homelike atmosphere. Bright coloured vinyl flooring has been introduced, planned to reduce noise and create a pleasing general appearance. On May 15, 1961, the first sod



Aerial view of the Dr. Mackinnon Phillips Hospital, Owen Sound.

was turned by Dr. Mackinnon Phillips and Public Works Minister Ray Connell. Construction started May 23. On September 25 the building was ready for cornerstone laying, which was done by Dr. Phillips, assisted by Mr. Connell and Health Minister Matthew B. Dymond. Occupation was scheduled to take place in mid-May 1963. The site comprises 92 acres, situated about one mile east of Owen Sound, and overlooking Georgian Bay close to the intersection of Highways 6 and 10. It will provide care for residents of Grey, Bruce and Dufferin counties.

Announcement was made in April 1962 that the contract for first-stage construction of the new hospital at Palmerston had been awarded to Anglin-Norcross (Ontario) Ltd., Toronto, whose bid of \$490,000 was the lowest of 10 firms bidding for the job. The first stage comprises the power, trades and garage buildings. The new hospital is being built about four miles from Palmerston on Highway 23, between Palmerston and Listowel. It will be the product of intense architectural research that has surveyed the most modern hospitals in North America. Tenders for the remainder of the project, estimated at about \$3,500,000, were called early in March. At the end of March first stage overall construction was about 93 per cent. Most of the boiler room equipment was installed and the general contractor and sub-trades were finishing off and cleaning up in preparation for anticipated completion by the end of April.

The new Clinical Services Group of buildings at Port Arthur Ontario Hospital was occupied in March, 1963. This new unit comprises three wings—central, male and female buildings. It was built by Bird Construction Company

Ltd. of Port Arthur at a contract price of \$2,550,777.



The new Pavilion, Ontario Hospital School, Orillia.

The Ontario Hospital School at Orillia was provided with a new 300-bed pavilion, trades and laundry buildings at the close of the period when it was reported substantially completed at 97 per cent. Angus Robertson Ltd., Toronto builders, were contractors for this project at a cost of \$2,003,000. Work started early in October 1961.

The new School of Nursing at Whitby was in the final stages of construction. Interior and exterior painting was nearing completion and some minor plumbing and electrical work remained to be done. The contract for this work

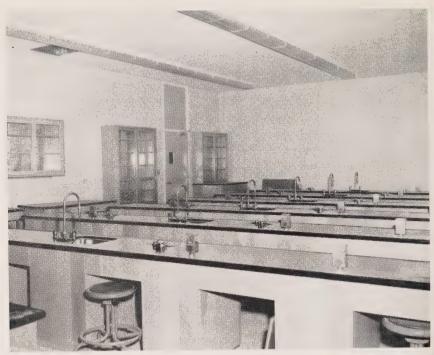


The new School of Nursing, Ontario Hospital, Whitby.

went to Newman Bros. of St. Catharines for \$993,407 in January 1962, and construction started on March 6, 1962. Jackson Ypes & Associates of Toronto were associate architects. A description was given in the previous year's Report.

The new Laundry building for the Ontario Hospital at London, contracted to W. A. McDougall Ltd. of London for \$472,868 on December 27, 1961, was finished in November 1962, with all tests completed the following December. This 200 by 82-foot building is located north of the new powerhouse built two years ago.

Extensive renovation was carried forward at the Ontario Hospital, Woodstock, and the Psychiatric Research Institute for Children at Byron. Repair and renovation work, various installations, and works of a comparatively minor nature were undertaken at many other Ontario Hospitals.



Science Laboratory, School of Nursing, Ontario Hospital, Whitby.

# For The Ontario Hospital Services Commission

Prime Minister John P. Robarts officially opened the new Nightingale School of Nursing in Toronto on December 3, 1962, when a plaque to commemorate the event was unveiled. The administrative staff had moved in on August 23 and the students on September 6. Construction of the Nightingale School of Nursing started in February 1961 on a site at the northwest corner of Elm and Murray Sts., directly behind the Mount Sinai Hospital and donated by the hospital. A description of this building was given in the previous Report. The contract award went to Hurley-Gregoris Construction Co. of Weston at a price of \$1,170,000.

Extensive structural, mechanical and electrical alterations to the I.B.M. room were completed at the Ontario Hospital Services Commission's Head Office Building on Yonge St., Toronto.

#### For The

#### **Department of Highways**

Great expansion in facilities for the Department of Highways took place with the provision of many metal patrol garages, and some masonry patrol garages, varying in size from three to 11 bays. All construction was completed on a District Repair Garage and 18-bay Heated Storage building at Sault Ste. Marie, a paint shop addition at the Ottawa District Office and Garage as well as an extension to the Office building at Huntsville.

The District Repair Garage and 18-bay Heated Storage building at Sault Ste. Marie was begun in August 1961 under contract to Newman Bros. Ltd. of St. Catharines for \$524,355. It was essentially completed in May 1962 and Department of Highways were handed the keys to the building on June 26, 1962. All phases of the work were finished in September.

Metal patrol garages erected were all of similar construction. They were built, or are being built, to a standard design consisting of metal roof and walls, concrete floors and wooden overhead doors. Each bay is 18 feet high, 40 feet long and 16 feet wide. The 40 by 16-foot office sections accommodate an office, lunchroom, washroom and locker room with space for tool storage. Garages for which contracts were awarded together with relative degree of construction as of March 31, 1963, are:

#### THREE BAYS

UPSALA — A \$39,458 contract was awarded to Welcon Ltd., Guelph, on October 4, 1962. The garage is being built on Highway 17, about one mile west of Upsala. Upsala is some 90 miles northwest of Port Arthur. The project is 80 per cent completed.

WAHNAPITAE — This contract was awarded to Hill-Clark-Francis Ltd. of Sudbury for \$33,300. Construction had advanced to 94 per cent at a site located at the junction of Highways 17 and 537, about 12 miles west of Sudbury.

#### FOUR BAYS

MADAWASKA — A \$37,933 contract was awarded on October 10, 1962, to Carl J. Lehman & Sons Ltd., Pembroke. The garage is being built on the south side of Highway 60, about two-and-a-half miles east of Madawaska. Overall completion is 35 per cent.

ROSENEATH — M. J. Finn Construction Ltd., Peterborough, was awarded a \$35,433 contract in October 1962 for this building which is being located on Highway 45 at Roseneath, about 20 miles north of Cobourg. The job stands at 85 per cent.

- BATCHAWANA Welcon Ltd., Guelph, received a \$39,895 contract in October 1962 for this garage. It is 30 per cent completed and is being erected on property where some Department of Highways frame buildings are already sited, just north of Trans Canada Highway No. 17 on Batchawana Bay, and only a short distance from the Town of Batchawana.
- COBDEN A \$34,271 contract was awarded early in February 1963 to M. J. Sulpher & Sons Ltd. of Renfrew. Work on the project had not yet started.
- SHELBURNE Bedlington Construction Co. of Burlington received a \$36,297 contract on January 29, 1963, to erect this building on a site about one mile north of Shelburne on Highway 24, just north of the junction of Highways 10 and 89. The job had not yet been started.
- CLOYNE A \$37,416 contract was awarded in September 1961 to Welcon Ltd. of Guelph for this job. Construction was completed and a final inspection made in June 1962.
- GOSHEN Construction of this garage began in September 1961. Welcon Ltd., Guelph, were builders at a contract price of \$37,356. The project was completed and an inspection made in May 1963.
- MINDEN Construction of this garage started the latter part of 1961 and it was completed by July 1962. The contract was for \$38,116, awarded to Welcon Ltd. of Guelph.
- NAGAGAMî This building was begun in November 1961, and the job finished in July 1962. It was built by Welcon Ltd., Guelph, for a contract price of \$41.787.
- WHITEFISH All work on this project was finished in January 1963. Construction started in December 1961. A \$34,916.17 contract for the work was awarded in November 1961 to Rio Construction Co., Elliot Lake.
- EMSDALE Farquhar Construction Co. of North Bay was awarded a \$37,407 contract on October 5, 1962, for this garage in the Parry Sound district. The building is sited at the diversion of Highway No. 11 near Church St., just south of Highway 518, north of Huntsville. It is substantially completed at 98 per cent.

#### **FIVE BAYS**

- DURHAM Started in November 1961, this garage was fully completed and occupied in May 1962. James Kemp Construction Ltd. of Hamilton did the job at a contract price of \$40,600.
- APSLEY This garage is essentially completed at 99 per cent. A \$40,979 contract was awarded in October 1962 to M. J. Finn Construction Ltd. of Peterborough to erect the building on the west side of Highway 28 immediately south of Eel's Creek diversion in the Township of Peterborough.

- PETER'S CORNERS Early in October 1962 Wilchar Construction Company Ltd. of Dundas received a contract award for \$38,500 to build this garage at the junction of Highways 52, 5 and 8. It was finished in November.
- stouffville This garage is essentially completed and final inspection has been made. A \$40,995 contract was awarded in October 1962 to Welcon Ltd., Guelph, to locate the building on the east boundary of Stouffville on Highway 47, immediately south of Highway 48 in Markham Township.
- GRAND BEND Construction on this garage began in October 1962. It is being built for a contract price of \$40,760 by Daly Construction Co. of Guelph and is about 60 per cent done.
- CRAIGHURST Les Bertram & Sons Ltd., Barrie contractors, received a \$37,956.42 contract in November 1962 to build this garage on the northwest corner of Highway 93 at the junction of the Fergusonville Road, about eight miles north of Barrie. Construction advanced to 37 per cent.
- REECE'S CORNERS The award for this garage went to Logan Contracting Ltd., Stratford builders, on November 27, 1962, for \$39,657. The garage has reached 95 per cent completion on a site at the intersection of Highways 7 and 21, east of Sarnia.
- SESEKINIKA Overall completion of this job is 40 per cent. A \$39,300 contract award went to Pulsifer Construction Ltd. of Kirkland Lake in December 1962, to build this garage in the Township of Maisonville in the Timiskaming district on No. 11 Highway.
- ST. MARY'S Erection of this garage began on September 14, 1961, and it was finished in June 1962. A contract of \$40,362 was awarded to Welcon Ltd. of Guelph for the job in September 1961.
- STRATHROY Welcon Ltd., Guelph contractors, also received a \$40,562 contract award to erect this job. It was started on September 11, 1961, and was fully completed in May 1962.
- WALKERTON Personnel of the Department of Highways moved into this garage during April-May, 1962. Construction began in November 1961. It was erected by James Kemp Construction Ltd., Hamilton, at a price of \$41,200.
- COURTLAND Thomas Construction Co., Galt, was awarded a \$37,695 contract early in February 1963 for this garage which will be built on the west side of Highway 59, about three miles south of Courtland. Construction has not yet started.

#### SIX BAYS

CLINTON — The Galt contracting firm of Daly Construction Ltd. received a \$44,055 award for this building on October 2, 1962. The project had advanced to 56 per cent as of March 31, 1963.



Construction progress of the new six-bay Patrol Garage, Porquois Junction.

- PORQUOIS JUNCTION This new garage is 70 per cent completed and is being built near the junction of Highways 11 and 67. Porquois Junction is about 32 miles south of Cochrane. Gerard Builders of North Bay Ltd., North Bay, are the builders at a contract price of \$47,360.
- HAWKESBURY Sinclair Supply Company Ltd., Vankleek Hill, was given a \$39,903 contract on October 11, 1962, to erect this garage on Highway 17 at the junction of the main road leading into Hawkesbury. Work was well advanced at the end of March.
- CRYSTAL BEACH (near Brockville) Construction of this garage, which was started at this location the latter part of 1961, was fully completed in June 1962. Dodge Construction Company Ltd., Cardinal, received a \$44,535 contract award to do the job.
- CAMDEN EAST This building is being erected just south of Highway 401 on the west side of the County Road, about a quarter-mile south of the interchange in the County of Frontenac-Addington, northwest of Kingston, and is substantially completed at 98 per cent. Hugh Murray Ltd., Belleville contractors, received a \$53,965 contract for the job in October 1962.

#### EIGHT BAYS

- BRAMPTON In March 1962 Ramsay Contracting Company Ltd., Toronto, was given a \$62,715 contract to build this garage at the northeast corner of the intersection of Highways 401 and 10. It is one-storey, 163 by 42 feet, and of brick concrete block and steel joist construction with flat roof and concrete foundations. It was finished in September 1962.
- MORRISTON Construction of this patrol garage began on April 3, 1962. The contract for the job was awarded to Daly Construction Company Ltd., Galt, for \$61,425. The garage was completed in February and the keys turned over to Highways personnel on January 18, 1963.

#### **ELEVEN BAYS**

ST. CATHARINES (Homer) — The contract to build this garage was awarded in March 1962 to Viking Construction (Niagara) Ltd., St. Catharines, for \$72,464. Construction began in April and it was substantially completed in March 1963. It was erected at a site north of the Queen Elizabeth Way, east of Highway 8, about two miles from the Welland Canal at St. Catharines. It is one-storey, 217 by 42 feet, and of brick, concrete block and steel construction with tar and gravel flat roof and concrete foundations. It contains 11 garages with wooden overhead doors, tool and storage rooms, lunchroom, locker room and office area. The large garage section is divided into heated and unheated divisions



The new eleven-bay Patrol Garage, St. Catharines (Homer)

The paint shop addition to the Ottawa District Office and Garage was substantially completed in February 1962, but interior work on the heating and ventilation systems was continued until August when full occupation by Department of Highways' personnel took place. L. Zuccarini of Ottawa received a \$50,500 general trades award for this job in August 1961.

An extension to the District Office building at Huntsville was completed in August 1962. This small frame basement and first floor building was built by Farquhar Construction Ltd., North Bay, for a contract price of \$29,081.

At Downsview, construction of an extension to the existing boiler room to house an additional boiler and incinerator facilities was in progress and about 60 per cent done; considerable partition changes were being made at the Office and Laboratory building to house a Lands and Forests department formerly occupying space at 454 University Avenue; installation of new air circulation and refrigeration units at the Administration building was under way in addition to varied other work to suit the requirements of various divisions.

#### For The

## **Department of Lands and Forests**

The two main projects for the Department of Lands and Forests brought to substantial completion were the new Seed Extraction Plant at Angus and the Parry Sound Chief Ranger's Headquarters.

A \$204,134 general trades contract for the Seed Extraction Plant at Angus was awarded to Emery Engineering and Contracting Company Ltd. of Barrie on July 12, 1962. The plant was built on a very attractive site located south of Highway 90, about 30 miles west of Barrie. It is situated between existing greenhouses and a workshop building. The plant was designed to meet varying conditions and can be adapted to take either small or large loads of cones for



The new Seed Extraction Plant, Angus.

seed processing. The seeds are extracted and tested and then shipped to those parts of the province where they are needed for reforestation purposes. Special electrical and mechanical equipment has been provided for safety purposes on account of the resinous nature of the cones. Attention has also been given to humidity and temperature controls. The building has three floors but no basement and each floor varies in size. The first floor, 99 by 50 feet, accommodates processed cone storage, seed cleaning, seed germination, seed testing and drying rooms, and bagging. Contained on the 50 by 42-foot second floor is a large extraction area and four kiln rooms. The third floor, 42 by 40 feet, houses raw cone storage. Loads are lifted to this floor, conveyed to the second floor for seed extraction and thence to the first floor for processing. At the end of the fiscal year construction of the building was substantially com-

pleted except for exterior painting, final cleaning and grading. Installation of some equipment was delayed due to design changes.

Construction of the Parry Sound Chief Ranger's Headquarters building was almost completed. This new building was constructed on existing Lands and Forests property on the waterfront by Konvey Construction Company Ltd. of Kingston for a contract price of \$166,568. Work on the project began in November 1961. It is about 180 feet in length and 65 feet broad with an 80 by 24-foot wing section. Accommodation provides offices for the chief ranger, biologist, a large staff office, radio room, meeting room, stockroom and boiler space. Also provided are warehousing facilities, paint and carpentry shops, and a repair garage for vehicles, pumps and outboard motors.



Advanced construction of the new Chief Ranger's Headquarters building, Parry Sound.

# For The Province of Ontario Savings Offices

At Windsor, the bank was moved from the second floor to the ground floor of the Canada Building on Ouellette Ave.

# For The Department of Reform Institutions

Capital works amounting to \$3,592,830 in general trades contracts were completed and considerable other work of a renovation nature carried forward at the many training schools, industrial farms and reformatories administered by the Department of Reform Institutions.

The two big jobs were the new Training School for Girls at Lindsay and the Boys' Training School at Simcoe, both of which accommodate 125 inmates.

The Lindsay institution was officially opened on July 31, 1962, when the Hon. Leslie M. Frost unveiled a plaque commemorating the event. He was assisted in these ceremonies by the Hon. Irwin Haskett, Minister of Reform Institutions and Hon. Ray Connell, Minister of Public Works.

Chester C. Woods, Toronto, was the associate architect on this project which was contracted to Len Ariss & Company Ltd. of Guelph for \$1,348,000. Construction began on August 15, 1960, and general construction was finished in August 1962. This training school stresses academic instruction, freedom within the bounds of the institution and attractive interior decor.

The Boys' Training School at Simcoe is similar to that at Lindsay. Dunker Construction Ltd. of Kitchener received a \$1,284,444 general trades contract to build the structure in April, 1961, at a site south of No. 3 Highway on Ireland Road near Victoria Street, about half-a-mile southeast of Simcoe. Provincial Treasurer, the Hon. James N. Allan, unveiled a commemorative plaque on November 7, 1962, to officially open the building, assisted by Deputy Minister J. D. Millar representing the Department of Public Works, and the Hon. Irwin Haskett, Minister of Reform Institutions. All construction on the project was completed in December 1962.

At Monteith Industrial Farm, construction of two new dormitories and a single staff quarters, which have been under way since October 17, 1960, were substantially completed. No. 1 dormitory and the single staff quarters were finished early in 1962. Most of the work at this location this year has been on bringing No. 2 dormitory to completion and on renovations to the old administration building. Hill-Clark-Francis of North Bay were general contractors with a \$707,436 contract award.



Single Staff Quarters, Industrial Farm, Monteith.



The new School Unit, Boys' Training School, Cobourg.

Construction was maintained during the year at the Cobourg Training School on a new school unit. The Toronto firm of Lynch-Richards Construction Co. erected the building at a contract cost of \$158,000. Work on the 118 by 108-foot school building began on October 5, 1961, and it was finished in July 1962.

Mimico Reformatory was provided with a new administration building. The new building has been erected on the easterly side of the existing adminis-



The new Administration building, Ontario Reformatory, Mimico.

tration building facing Bismark Road. The contract for this job was awarded to D. A. Sinclair Construction Co., Cooksville, whose \$94,950 was the lowest of eight bidding for the project which is a 97 by 37-foot basement and one-storey building of masonry construction with brick face and flat roof. A covered corridor connects with the existing administration building. The administrative, purchasing and records office are contained on the first floor. Storage rooms, vault space and a section of inmates' files are located in the basement. The new building was turned over to Reform Institutions in November 1962. The new powerhouse, contracted in 1961 to Wilkinson Construction Co. of Toronto for \$212,176, and which was substantially completed the previous year, was completed in all its details in June 1962 and turned over to Reform officials. Other work at this site comprised renovation of the old powerhouse.

A garage, workshop and stores building was completed in July for the Ingleside Ontario Women's Guidance Centre at Brampton. G. & J. Wintjes Construction of Gormley was awarded a \$10,460 contract for this job in December 1961.



The new Garage, Workshop and Stores building, Girls' Training School, Brampton.

# For The Department of Travel and Publicity

Contract for construction of a year-round tourist reception centre at Windsor was awarded to Sweet Construction Ltd., Essex, at \$111,000. The new reception centre is in Windsor's new civic square, handy to the exit from the tunnel from Detroit. The building is radically new in design. The main feature is a reinforced concrete "butterfly wing" roof which is cantilevered with extensive overhang beyond the 40 by 60-foot building. Much of the wall area is insulated



Front view of the new Tourist Reception Centre, Windsor.



Rear view showing Tea Terrace, Tourist Reception Centre, Windsor.

plate glass set in reinforced steel channels clad with anodized aluminum. Interior walls are concrete block faced with wood panelling, plaster or ceramic tile. In addition to the public enquiry area, there are washrooms, office and staff rooms. A tea terrace with a perforated concrete screen flanks the centre.

#### HISTORICAL SITES

Plaques marking historical sites were erected at Exeter, Ipperwash, North Bay and Sarnia.

#### For The

#### Ontario Water Resources Commission

An additional water supply system was run from the termination point of the Humber River intake line for pollution testing purposes for various laboratories at the Laboratories Research Building on Highway 401 at Islington Ave. Additional furnishings and laboratory equipment were supplied and installed in offices, experimental rooms and maintenance rooms.

#### For The

#### **Ontario Government Exhibits**

The Canadian National Exhibition was held in Toronto from August 17 to September 3, inclusive, 1962. The Department of Public Works organized the preparation of the building for an exhibition by the combined departments of the Ontario Government.

This involved major renovation to the interior of the building and new innovations to the general exhibition areas. New general lighting was installed in the northeast and northwest sections of the building; all exhibit lighting panels were moved from the ground floor to the basement, and the floors and walls of the interior painted. Log siding was removed from the fish tanks located in the Department of Lands and Forests exhibit in the courtyard, leaving the original stone front. Complete new seating was supplied and a new and larger screen installed in the movie theatre.

Exhibiting were the Departments of Agriculture, Attorney General, Economics and Development, Education, Health, Highways, Labour, Lands and Forests, Mines, Provincial Secretary and Citizenship, Public Works, Reform Institutions, Transport, Travel and Publicity and Water Resources.

The Central Canada Exhibition was held in Ottawa from August 17 to August 25, inclusive, 1962. The Ontario Government exhibit, which forms a part of this annual exhibition, was organized by the Department of Public Works, who also supplied the installation and maintenance of all mechanical services, interior redecoration of the buildings, exhibit settings and sign work for the various governmental departments exhibiting.

Displays were prepared by the Departments of Agriculture, Health, Highways, Planning and Development and Reform Institutions.

#### BOILER INSPECTION

The boiler inspection work of this Department, as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs as to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario Hospitals and Reformatories, the reports as referred to were sent to the Departments of Health and Reform Institutions respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir,

Your obedient servant,

D. G. Creba,

Chief of the Architects' Branch

Sarehe.

Toronto, March 31, 1963.

# Report of the Chief of the Property and Surveys Branch

Parliament Buildings, Toronto, Ontario, March 31, 1963.

MR. J. D. MILLAR,
Deputy Minister,
Department of Public Works.

The following is a general summary listing the major transactions for which negotiations were completed by members of the Property and Surveys Branch during the fiscal year 1962-63:

94 Purchases	\$5,005,038.58
128 Leases	2,773,433.76
54 Sales	408,986.54
276 Transactions	\$8,187,458.88

The totals for the previous three years were:

1959-60 — 194	Transactions -	_	\$12,453,472.73
1960-61 — 235	**		3,012,788.52
1961-62 — 258	"		3,421,274.64

#### **Appraisals and Valuations**

Conservation Authorities	70	\$1,101,334.22
Water Lots	19	109,937.00
Other Valuations	2	28,200.00
	91	\$1,239,471.22

#### **Property Management Section**

Taxes	10 Items	\$	12,786.23
Insurance	9 Premiums		19,508.94
Revenue from Property	212 Collections		911,918.50
Requisition of Rent	2,822 Payments	1	,287,010.39

#### SURVEYS DIVISION

During the year 99 survey requests were submitted to the Surveys Division, and 69 have been completed, with work under way or scheduled on the remainder. Assistance has been given to other Branches and other Departments in the preparation of legal and architectural surveys in the acquisition and leasing of property and other pertinent data required in the siting of buildings or the installation of services.

A start has been made on the preparation of Master Plans to be used in conjunction with the new Property Directory, although full implementation of the programme has been delayed through lack or loss of staff.

The foregoing is a brief summary of work carried out throughout the Province in negotiating the acquisition, leasing or disposing of properties in the interests of the various other Departments, where real estate is required, to meet the needs arising from the various programmes under their supervision.

The 276 transactions totalling \$8,187,458.88 represents considerable work involving negotiations with property owners throughout the Province. This



The newly acquired six-storey Bay-Grosvenor building, 880 Bay Street.

does not, however, indicate the total work load, as it is usually necessary to carry out negotiations on alternative property in order to determine the most suitable from the standpoint of cost and suitability.

Two transactions involving large sums of money were the acquisition of the 6-storey Bay-Grosvenor Building at 880 Bay St., to round out the site for the extension of Queen's Park, and the transfer of some 600 acres between Keele and Jane Streets south of Steeles Ave. for the use of York University.

In line with general procedures which have developed over the last few years, centralized control in the purchasing and leasing of property has been exercised through this Branch, with the responsibility of preparing reports for and appearing at meetings of Treasury Board and the Ontario Parks Integration Board.

Effective April 1, 1963, responsibility for the payment of rent and other administrative duties involving 22 leases for space occupied by the Department of Highways, and 71 leases for the Ontario Provincial Police, was assigned to the Branch.

Arrangements were made for the transfer of title of 107 properties previously vested in the Department of Highways, in order that full utilization can be made of the office space in the various centres. This is a very involved problem, and it will take some considerable time to effect the transfer and to conduct space analyses in order to ensure optimum use of the properties.

Where time will permit, we are carefully studying buildings under the control of the Department to determine the need for leasing additional space to meet the numerous requests for expansion, which are continually arising.

Recommendations initiated within the Branch have assisted in having the payment of municipal taxes assigned to the Department of Municipal Affairs to avoid duplication of payment. Recommendations concerning fire insurance and the need for Public Liability coverage have assisted in the development of a new procedure approved by the Cabinet Committee on insurance.

A Property Directory has been completed, listing all property owned or leased, indexed in one section under the Department and Project, and in the second section under Geographic Location. This is purely an index of the numerous properties, and continual revision is necessary on a monthly basis as properties are acquired, leased or sold. A continual review of property considered surplus to the various Departments' requirements is maintained and recommendations forwarded for the sale or leasing, generally through public tender, to private concerns.

Before property is disposed of, all Departments of the Provincial Government are advised, as well as the local municipality, an appraisal is carried out by our field staff and a property survey is carried out by the Chief Surveyor, if same is not already available. On approval to proceed, the property is offered for sale or for rent through the office of the Tender Secretary, with advertisements appearing in the local press for appropriate periods, and where practical "for sale" or "for rent" signs are erected on the property.

Respectfully submitted,

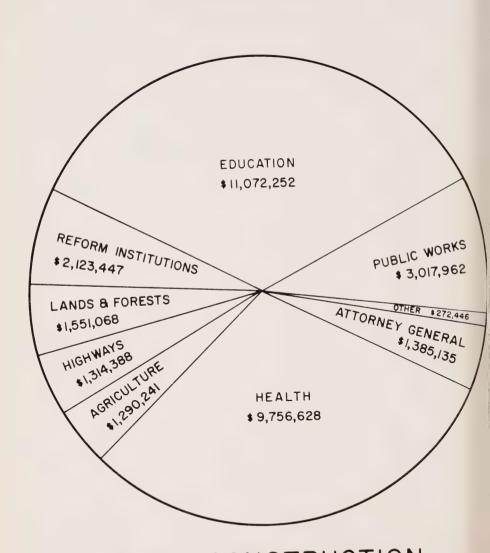
Everett J. Parker.

Chief of the Property and Surveys Branch.

Varkes

# ONTARIO DEPARTMENT OF PUBLIC WORKS CAPITAL EXPENDITURE

1962-63



NEW CONSTRUCTION and CAPITAL IMPROVEMENTS \$ 31,783,567 (Gross)

# Report of the Chief of the Accounts Branch

Department of Public Works, Ontario, Toronto, March 31, 1963.

MR. J. D. MILLAR,

Deputy Minister of Public Works,

Parliament Buildings,

Toronto, Ontario,

#### SIR:

I have the honour to submit detailed statements of Ordinary Expenditure of Civil Government and maintenance and repairs of Government Buildings and Public Works; also Capital Expenditures on Provincial Government Buildings and Public Works, during the fiscal year which ended on the 31st of March, 1963.

I have the honour to be, Sir,

Your obedient servant,

Chief of the Accounts Branch.

A /a. Easson

## Report of the Department of Public Works

#### Fiscal Year Ending March 31st, 1963

#### REPORT OF THE ACCOUNTANT

Operations of the Department continued at a level similar to that of the previous fiscal year. The following figures show a decrease of 5.74% in the total net expenditure:

 	 	1 PM P	
PFI			

Fiscal Year 1962-63 1961-62	<i>Ordinar</i> \$11,848,36 11,221,08	y Capital 6.85 \$26,377,041.33 9.39 29,330,195.61	\$38,225,408.18
	\$ 627,27	7.46 \$ 2,953,154.28	\$ \$ 2,325,876.82
Percent Increase Percent Decrease	5.59%	10.07%	5.74%

#### SUMMARY OF EXPENDITURES

#### For Fiscal Year April 1st, 1962, to March 31st, 1963

For Fiscal Year Apri		o march o isi,	1903
Service	Ordinary	Capital	Total
Main Office —			
Administration expenses, etc.	\$ 1,279,843.37		\$ 1,279,843.37
Maintenance and Repairs — Government Buildings	9,601,104.25		9,601,104.25
Public Works — Dams, Docks, Locks, etc.	94,036.38	844,081.39	938,117.77
Public Works — Aid to Drainage	775,400.51		775,400.51
Public Buildings Miscellaneous	97,982.34	25,532,959.94	25,532,959.94 97,982.34
	\$11.848.366.85	\$26,377,041,33	\$38,225,408.18

#### STATEMENT OF REVENUE

Commission on telegraphs and telephones Sale of Material Rentals Perquisites Building Equipment Miscellaneous Sale Property Plan and Contract Security Deposits	\$	12,748.31 9,145.03 970,834.65 3,273.00 2,009.85 9,801.20	11,338.92 714,270.09 48,510.00	\$ 12,748.31 20,483.95 970,834.65 3,273.00 2,009.85 9,801.20 714.270.09 48,510.00
	2	1 007 812 04 \$	774.119.01	\$ 1,781,931.05

# Statement of Expenditures, Main Office Maintenance, Repairs and Construction of Public Buildings

#### For Fiscal Year Ending March 31st, 1963

#### **ORDINARY**

Amount

Amount

Service

MAIN OFFICE

Minister's Salary       \$ 12,000.00         Salaries       996,889.21         Travelling Expenses       10,186.17         Maintenance       102,254.31         Insurance       18,040.91         Local Improvement Taxes, etc.       1,539.57         Unforeseen and Unprovided       166.40         Compensation — Medical, etc. for       11         Injured Workmen       85,402.87         Unemployment Insurance       53,363.93	\$ 1,279,843.37
	\$ 1,279,843.37
ONTARIO GOVERNMENT BUILDINGS  Salaries — Maintenance Staff	
	\$ 8,114,559.89
LEASED PREMISES  Rentals and Expenses	\$ 1,486,544.36
MAINTENANCE OF LOCKS, BRIDGES,	
DAMS AND DOCKS, ETC.	
Maintenance	\$ 94,036.38
47	

#### **ORDINARY** (Continued)

To provide for grants in aid of drainage work in accordance with The Provincial Aid to Drainage Act, 1954	
work in accordance with The Provincial Aid to Drainage Act, 1954\$ 749,940.45  Salaries and expenses in connection with preparing drainage schemes, and for the construction, improvement or reconstruction of trunk channels for farm drainage in Northern Ontario, including expenses in	
preparing drainage schemes, and for the construction, improvement or reconstruction of trunk channels for farm drainage in Northern Ontario, including expenses in	
may qualify for grants under The Provincial Aid to Drainage Act, 1954 24,206.40	
Municipal Drainage, including grants in aid	
thereof	
775,400.5	1
MISCELLANEOUS	
Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith\$ 69,984.26	
Aid — Dredging — Muskoka Dredging in the Muskoka Lakes	
Aid — Remedial Works, etc. — Grants to provide for purchase of lands, construction of remedial works, to alle- viate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor in Council 1,541.60	
Grant — City of Toronto — Re: Repairs to the Ontario Government Building at the Canadian National Exhibition, Toronto	
\$ 97,982.3	34
	-

TOTAL ORDINARY EXPENDITURE...

\$11,848,366.85

#### CAPITAL

Service	Amount	Amount
PUBLIC BUILDINGS		- Into with
To provide for the construction of new buildings and works, purchase of lands and buildings, alterations, equipment and extension of services to existing buildings and works and the purchase of construc- tion plant and equipment and materials for stores and expenses in connection		
therewith		\$25,532,959.94
DAMS, DOCKS AND LOCKS		
Construction of dams, docks and locks		844,081.39
TOTAL CAPITAL DISBURSEMENTS		\$26,377.041.33
SUMMARY		
ORDINARY EXPENDITURE		
Main Office, Maintenance and Repairs of Government Buildings		\$11,848,366.85
CAPITAL DISBURSEMENTS		
Public Buildings and Public Works		\$26,377,041.33

A. A. EASSON, Chief of the Accounts Branch.

\$38,225,408.18

TORONTO, March 31st, 1963.

## Report of the Chief of the Civil Engineering Division

Parliament Buildings, Toronto, Ontario, March 31st, 1963.

MR I D. MILLAR. Deputy Minister, Department of Public Works.

The work performed under the supervision of the Chief of Civil Engineering Division during the fiscal year 1962-63 was as follows:

#### 1. HYDRAULIC SECTION

(A) DAMS, DOCKS, LOCKS, ETC.

#### SUMMARY:

The investigation, pre-engineering, design, construction, inspection and approval of the work on dams, docks, locks, etc. was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas. Dredging work was carried out in the Muskoka area.

Two concrete dams and one trout rearing station, previously commenced, were completed. Five concrete dams and one shore protection wall were started and completed this year. Work on four concrete dams, one concrete lock and one rock filled dam was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

## BIRCH (GOUGH) LAKE DAM, Shakespeare Township, Sudbury

Building of the access road was completed last year and reconstruction of the dam was carried out this year. The dam was reconstructed with reinforced concrete resting on solid rock. It is 108 feet long and consists of a short approach wing wall providing access for the operation of the dam, one 14-foot sluiceway fitted with steel chases and timber stop logs and an overflow wing wall section with a 44-foot long crest. The head of water measured from the sluiceway sill to the controlled water level is 10 feet and the top of the deck is four feet above this level. A pair of stationary gear winches was installed to operate the stop logs. The approach wing wall and deck were fitted with a steel handrail for safety of operation.

## CEDAR LAKE DAM, Deacon Township, Nipissing District

The existing old timber crib dam in Algonquin Park at the outlet of Cedar Lake, was partly washed away during the heavy flood in April 1960. The dam was under supervision of the Federal Department of Public Works and was originally installed many years ago for driving of timber on the Petawawa River. In 1962, the damsite was transferred to the Ontario Department of Lands and Forests which was interested in preserving the lake for wildlife, recreation and forest protection purposes. The new dam, designed as an earth and rockfill crest overflow dam, is under construction. It is scheduled to be completed early next fiscal year.

# PROVINCIAL FISH HATCHERY, CHATSWORTH, Holland Township, Grey County

Work was commenced last summer and carried on this year. The five remaining circular ponds were completed in reinforced concrete making a total of 14.



View showing the completed Circular Ponds, Chatsworth Fish Hatchery,

## CRANE LAKE DAM, Conger Township, Parry Sound District

The dam at the outlet of Crane Lake was originally built in 1895 by a lumbering company and was maintained by private interests until 1925, when it was reconstructed in masonry by the Department of Public Works. It controls the water level in Crane and Blackstone Lakes. In 1962, the dam was found to be deteriorated beyond repair and during the winter an access road was built. Reconstruction will be carried out next fiscal year.

#### DELTA DAM, Bastard Township, Leeds County

A new dam for maintaining the level of Upper Beverly Lake was constructed at the Village of Delta to replace an old mill dam which had deteriorated beyond repair. The new dam was constructed with reinforced concrete on solid limestone. It comprises two 14-foot wide sluiceways controlled by timber stop logs and two reinforced concrete wing walls which key into banks at both sides of the river. The head of water from the sluiceway sills to the regulated water level is eight feet and six-feet-six-inches respectively and the top of the deck is four feet above this level. The overall length of the dam is 72 feet and the total height from foundation to deck is 20 feet. Two pairs of gear winches lift the stop logs. On October 19, 1962, an opening ceremony was performed by James A. C. Auld, M.P.P. for Leeds, Public Works Minister Ray Connell and local public officials.

## SHORE PROTECTION at Department of Lands & Forests Office, Dunnville

A steel sheet pile shore protection wall was constructed at the property of the Department of Lands and Forests in Dunnville for docking boats and protecting the grounds against erosion. The overall length of the steel pile wall is 213 feet, the front line is 173 feet long.

#### ENA LAKE DAM, Kenora District

A new reinforced concrete dam was constructed at the outlet of Ena Lake on the MacFarlane River, about 20 miles north of Kenora, to replace an old washed out crest overflow dam which controlled the water level on Ena and Corn Lakes. It rests on solid rock and comprises one 14-foot long sluiceway fitted with timber stop logs and a 150-foot long overflow wing wall. Overall length of the dam is 225 feet, the head of water from the sluiceway sill to the regulated water level is five feet and the top of the deck is three-feet-six-inches above this level. A pair of stationary gear winches operate the stop logs.

#### **EVANGELINE LAKE DAM, McKinnon Township, Sudbury District**

The original dam at the outlet of Evangeline Lake was built by lumbering interests and was washed out in the spring flood about 10 years ago. In 1961,

the Department of Lands and Forests requested reconstruction of the dam to control the water level and encourage propagation of fish and wildlife. The new dam was constructed with reinforced concrete resting on a thick layer of coarse gravel. It is 108 feet long and consists of one 14-foot sluiceway fitted with steel chases and timber stop logs, a stilling basin and two earth filled wing walls. It is 24 feet high and the head of water from the sluiceway sill to regulated water level is eight feet. The top of the deck is five feet above this level. A pair of stationary gear winches operate the stop logs. The deck of the dam was constructed as a bridge for a roadway over which considerable traffic is expected in the future. Guardrails and handrails were installed for safety of the traffic and safe operation of the dam.

#### FOREST LAKE DAM, Kenora District

Reconstruction of a dam on the Canyon River at the outlet of Forest Lake, about 20 miles northwest of Vermillion Bay, was completed on September 24, 1962.

The original dam on this site was built about 1929 by the Federal Government to generate power for the McIntosh Indian School. In 1961 Ontario Hydro installed power lines to the school and the dam, in poor condition, was taken over by the Department of Lands and Forests to regulate the water level on a chain of five lakes: Forest, Whitney, Edward, Alexander and Cobble.

The new dam is reinforced concrete with two 16-foot sluiceways fitted with timber stop logs. The head of water from the sluiceway sill to the regulated water level is five feet and the top of the operating deck is four-feet-eight inches above this level. Overall length of the rebuilt portion of the dam is 110 feet. Another 220 feet of wing wall of the existing dam was left in place but was reinforced with a 12-inch thick concrete facewall.

## HUNTSVILLE LOCKS, Brunel Township, Muskoka District

The gate sills were reconstructed with reinforced concrete and a set of timber gates constructed during the winter of 1962-63. The four new gate panels were completed and lowered into the lock chamber. They will be fixed into final position early next fiscal year.

## IVANHOE LAKE DAM, Ivanhoe Township, Sudbury District

Concrete work on the new dam was completed early in April of 1962 and work was commenced on the construction of the earth fill wing walls. A timber weir was erected approximately 320 feet downstream of the dam to assist in controlling possible erosion of the river bottom in the stilling basin area below the dam. The finished structure is approximately 300 feet long and 31 feet high from top of foundation slab to top of deck. The height from the main slucie-



The completed Ivanhoe Lake Dam, Ivanhoe Township, Sudbury district.

way sill to the controlled water level is 10 feet and the deck is six-feet-six inches above this level. The seven 14-foot sluiceways are equipped with timber stop logs and a pair of movable gear winches were installed on the deck for operation of the stop logs.

#### PORT CARLING BRIDGE, Medora Township, Muskoka District

The deck of the permanent span of the bridge, which crosses the Indian River, was reconstructed with laminated timber. Two new steel stringers were installed through the whole length of the span in addition to the existing ones, a six-inch thick laminated timber deck was placed and fastened to the stringers and an asphalt carpet placed on the top of the timber floor.

#### PORT CARLING DAM AND SMALL LOCK, Medora Township, Muskoka District

The dam which controls the water level in Lakes Rosseau and Joseph was originally installed by this Department as a timber crib dam in 1882. In 1922, it was reconstructed with concrete and at the same time a lock for passage of smaller boats was installed adjoining the northerly end of the dam. In 1962, both the dam and the "Small Lock" were found to be deteriorated beyond repair and a new design for these structures was developed in reinforced concrete by the Civil Engineering Staff of this Department. Construction work started in September, 1962.

A weatherproof building 160 feet long, 32 feet wide and 26 feet high, made of scaffolding frames, wooden laths and polyethylene sheets, was erected as a cover and concreting of the dam was carried out during the winter of 1962-63. Steam was supplied from a boiler station and, in addition, oil heaters were used as required for curing the concrete inside of the protection building. On March 31, 1963, concreting of the dam was completed and work was proceeded with on the remaining part of the project.

# RITCHIE FALLS DAM, Township "J", Algoma District

The dam at Ritchie Falls, which controls the level of Ritchie Lake and Aux Sables Lake, was originally installed by a lumbering company more than 50 years ago. It was washed out by floods in 1960 and in 1962 the Department of Lands and Forests requested its reconstruction.

During the fall of 1962, the access road to the site was improved, construction camp buildings erected and rock excavated for the by-pass channel and for foundation of the dam. The construction of the dam will be carried out next fiscal year.

## SNOWSHOE RAPIDS DAM, Kenora District

The existing timber crib dam at Snowshoe Rapids on the Chukuni River, about 20 miles southeast of Red Lake, was originally built in 1927 by the Chukuni Transportation Company, aided by Provincial subsidy. It raised the water level on a chain of five lakes — Two Island, Gullrock, Keg, Ranger and Red and the interconnecting channels — to allow barging of supplies for the mining industry in the area. Completion in 1948 of Highway No. 105 to Red Lake ended the need for barging and the facilities built for this purpose were allowed to deteriorate. In 1962, the dam could no longer maintain the water level. An access road to the site has been constructed and reconstruction of the dam will be carried out during the next fiscal year.

# WATTS DAM, Armour Township, Parry Sound District

The existing timber crib overflow dam on the Magnetawan River, five miles southeast of Burks Falls, had been damaged by floods and was in danger of being destroyed completely. It controlled the level of Doe Lake. The new dam was constructed with reinforced concrete. It is 130 feet long and consists of five 14-foot sluiceways and reinforced concrete wing walls. The head of water measured from the sluiceway sill to the regulated water level is five feet and the top of the deck is five feet above this level. The discharge flow through the dam is controlled by timber stop logs with a pair of movable gear winches. The dam is capable of discharging 4,000 cubic feet of water per second from a normal flood level.



Construction progress of Watt's Dam, Armour Township, Nipissing.

## CURRENT REPAIRS AND MINOR CONSTRUCTION WORK

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the overhauling of stop logs, winches and painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Healey Lake Dam, Parry Sound District; Knoephli Dam, Parry Sound District; Le Grou Lake Dam, Parry Sound District; Matinenda Lake Dam, Algoma District; Noganosh Lake Dam, Parry Sound District; Oastler Lake Dam, Parry Sound District; Port Sandfield Dock, Muskoka District; Lake of Two Rivers Dam, Nipissing District; Whitney Dam, Nipissing District, and the dock at Rondeau Park.

#### DREDGING:

The Muskoka River about one-and-a-half miles south of Huntsville in Lot 14, Concession 13, Brunel Township, was deepened under contract by the use of floating dredging equipment in order to expedite the flow of water through the Huntsville Dam. Approximately 13,000 cubic yards of material was excavated and two old derelict scows and a dredge were removed and sunk in 60 feet of water in Mary Lake.

#### GENERAL:

Minor repairs, adjusting of winches, painting of steel parts, replacing of stop logs, etc., were made to eight dams and one steel bridge which are not listed above. Timber protection booms were repaired and replaced in front of 14 dams and 18 steel cable guard wires were checked and adjusted across chan-

nels upstream from dams for safety and protection of careless boat operators. Driftwood and beaver dams were removed from 28 dams,

The construction equipment was overhauled and repaired and made ready for use in the ensuing season.

## (B) AIDS TO NAVIGATION

Two hundred and sixty floating buoys, 75 spar buoys and 15 rock signs were placed on the navigation routes in the areas of Lakes Muskoka, Rosseau and Joseph; 53 floating buoys were placed in Ahmic Lake, Lake Cecebe and the Magnetawan River; 55 floating buoys and two spar buoys were placed in Lake Vernon, Peninsula and Fairy Lakes, the Muskoka River and Mary Lake.

#### (C) LOCKAGES

The records of watercraft which were passed through the three locks operated by the Provincial Government were as follows:

Port Carling Huntsville Magnetawan	Boats over 30 ft. in length 2,245	Small Boats 9,869 1,407 269	Scows 7	Total 12,121 1,407 269
	2,245	11,545	7	13,797

#### (D) REMEDIAL WORKS

A grant of \$1,541.60 was paid for flood relief to the Township of Casey, District of Temiskaming.

#### 2. DRAINAGE SECTION

# (A) PROVINCIAL AID TO DRAINAGE

Grants paid during the fiscal year 1962-63 to organized municipalities:

BRANT: Burford Township, 6 grants, \$10,967.53. BRUCE: Carrick Township, 1 grant, \$617.98; Culross Township, 1 grant, \$783.33; Huron Township, 4 grants, \$5,558.67; Kincardine, 1 grant, \$2,051.97. CARLETON: North Gower Township, 1 grant, \$2,493.63. DUFFERIN; Amaranth Township, 2 grants, \$2,008.11; Melancthon Township, 2 grants, \$918.20. DUNDAS: Matilda Township, 2 grants, \$4,055.62; Mountain Township, 1 grant, \$1,429.82; Winchester Township, 4 grants, \$6,300.67. ELGIN: Aldborough Township, 4 grants, \$5,043.97; Bayham Township, 3 grants, \$4,140.58; Dun-

wich Township, 23 grants, \$12,160,98; Malahide Township, 2 grants, \$1,145,95; South Dorchester, 3 grants, \$2,097.96; Southwold Township, 7 grants, \$5,546.86; Yarmouth Township, 2 grants, \$4,179.84. ESSEX: Tecumseh (Town), 1 grant, \$20,518.05; Anderdon Township, 18 grants, \$28,539.10; Colchester North, 3 grants, \$5,036.43; Colchester South, 5 grants, \$2,524.37; Gosfield North, 16 grants, \$8,271.98; Gosfield South, 2 grants, \$2,014.01; Maidstone Township, 11 grants, \$20,229.22; Malden Township, 6 grants, \$4.841.71: Mersea Township, 13 grants, \$37,509.45; Pelee Township, 1 grant, \$547.30; Rochester Township, 6 grants, \$9,218.28; Sandwich South, 15 grants, \$20,096.15; Tilbury North, 1 grant, \$485.76; Tilbury West, 5 grants, \$4,163,23, GLENGARRY: Charlottenburgh Township, 6 grants, \$11,570.42; Lancaster Township, 1 grant, \$1,028.41; Lochiel Township, 1 grant, \$1,226.42. GRENVILLE: Oxford-on-Rideau, 1 grant, \$1,650.32. HALDIMAND: Sherbrooke Township 2 grants, \$1,122.22. HURON: Zurich (Village), 1 grant, \$510.07; Ashfield Township, 2 grants, \$3,441.67; Colborne Township, 2 grants, \$2,302.10; Grey Township, 4 grants, \$1,741.22; Hay Township, 1 grant, \$777.07; Howick Township, 4 grants, \$2,427.69; Hullett Township, 4 grants, \$6,399.04; McKillop Township, 4 grants, \$6,672.03; Morris Township, 1 grant, \$1,035.13; Stanley Township, 2 grants, \$4,529.95; Stephen Township, 1 grant, \$616.67; Tuckersmith Township, 4 grants, \$6,373.21; Turnberry Township, 1 grant, \$315.00; Usborne Township, 1 grant, \$282.84; West Wawanosh Township, 1 grant, \$2,687.00. KENT: Camden Township, 9 grants, \$4,822.97; Chatham Township, 14 grants, \$12,762.16; Dover Township, 34 grants, \$39,005,76; Harwich Township, 17 grants, \$6,995.87; Howard Township, 5 grants, \$3,412.55; Orford Township, 10 grants, \$6,375.06; Raleigh Township, 16 grants, \$7,399.55; Romney Township, 1 grant, \$2,512.22; Tilbury East, 3 grants, \$2,182.00; Zone Township, 10 grants, \$4,538.20. LAMBTON: Wyoming (Village), 1 grant, \$135.44; Bosanquet Township, 11 grants, \$13,068.70; Brooke Township, 9 grants, \$9,866.44; Dawn Township, 12 grants, \$12,591.97; Enniskillen Township, 7 grants, \$10,714.00; Euphemia Township, 8 grants, \$9,178.22; Moore Township, 5 grants, \$3,533.16; Plympton Township, 13 grants, \$11,361.84; Sarnia Township, 5 grants, \$3,510.99; Sombra Township, 7 grants, \$8,111.79; Warwick Township, 10 grants, \$11,418.49. MIDDLESEX: Adelaide Township, 7 grants, \$19,086.23; Caradoc Township, 2 grants, \$2,326.67; Delaware Township, 3 grants, \$5,769.93; East Williams, 3 grants, \$2,679.25; Ekfrid Township, 4 grants, \$2,275.24; Lobo Township, 1 grant, \$3,896.18; London Township, 6 grants, \$8,590.31; McGillivray Township, 3 grants, \$8,066.39; Metcalfe Township, 11 grants, \$9,771.12; Mosa Township, 7 grants, \$4,952.87; North Dorchester, 3 grants, \$18,129.51; Westminster Township, 1 grant, \$430.52; West Nissouri, 5 grants, \$13,111.96; West Williams, 1 grant, \$1,113.67. NORFOLK: Charlotteville Township, 3 grants, \$4,869.19; Houghton Town-

ship, 1 grant, \$354.80; Middleton Township, 4 grants, \$4,461.31; North Walsingham, 2 grants, \$1,429.56; Townsend Township, 2 grants, \$3,380.60; Windham Township, 6 grants, \$11,742.53. OXFORD: Blandford Township, 2 grants, \$2,015.27; Dereham Township, 11 grants, \$15,881.08; East Nissouri, 2 grants, \$1,149.56; East Oxford, 3 grants, \$10,547.35; East Zorra, 2 grants, \$1,450.93; North Norwich, 5 grants, \$3,921.90; North Oxford, 1 grant, \$1,130.00; South Norwich, 4 grants, \$11,347.07; West Oxford, 1 grant, \$1,128.36; West Zorra, 1 grant, \$602.80. PERTH: Blanshard Township, 4 grants, \$2,149.99; Downie Township, 1 grant, \$2,452.80; Ellice Township, 7 grants, \$5,140.87; Elma Township, 6 grants, \$8,563.93; Fullerton Township, 4 grants, \$7,237.67; Hibbert Township, 1 grant, \$4,277.97; Logan Township, 4 grants, \$2,849.14; Mornington Township, 3 grants, \$3,066.00; South Easthope, 2 grants, \$1,157.33; Wallace Township, 4 grants, \$5,360.08. PRES-COTT: East Hawkesbury, 2 grants, \$2,017.72. RUSSELL: Cambridge Township, 2 grants, \$1,999.01; Cumberland Township, 6 grants, \$6,248.48; Russell Township, 1 grant, \$3,286.23. SIMCOE: Essa Township, 2 grants, \$872.20; Flos Township, 1 grant, \$2,415.15; Vespra Township, 1 grant, \$796.05; West Gwillimbury, 2 grants, \$1,000.33. STORMONT: Cornwall Township, 1 grant, \$2,598.98; Roxborough Township, 1 grant, \$3,047.52. WATERLOO: Wellesley Township, 3 grants, \$2,352.86; Wilmot Township, 2 grants, \$1,334.43. WELLAND: Bertie Township, 1 grant, \$583.83; Humberstone Township, 2 grants, \$3,728.62; Wainfleet Township, 4 grants, \$3,704.86. WELLINGTON: Maryborough Township, 2 grants, \$3,741.88; Minto Township, 3 grants, \$3,525.61. ALGOMA (DISTRICT): Macdonald, Meredith and Aberdeen Additional, 2 grants, \$3,476.68. RAINY RIVER (DISTRICT): Alberton Township, 1 grant, \$3,558.17. SUDBURY (DISTRICT): Salter, May and Harrow, 1 grant, \$6,021.33. TOTAL: 606 grants - \$749,940.45.

# FINANCIAL ASSISTANCE TO TERRITORIAL DISTRICTS

#### NON-MUNICIPAL:

The Provincial Aid to Drainage Act 1954, provides for financial assistance up to 80 per cent of the cost of approved drainage works in unorganized Townships in Territorial Districts and Provisional Counties. The remaining 20 per cent of the cost is paid by the owners of the benefitting lands. Financial assistance under the provisions of the Provincial Aid to Drainage Act, 1954, amounted to \$9,505.12 on 7 drainage projects, as follows: MANITOULIN: Campbell Township, \$1,232.00. COCHRANE: O'Brien Township, \$1,132.12; Hanlan Township, \$1,559.20; Owens Township, \$1,156.68; Owens Township, \$1,556.30. NIPISSING: Kirkpatrick Township, \$936.00; MacPherson Township, \$1,932.80.

#### (B) MUNICIPAL DRAINAGE

GRANTS PAID TO ORGANIZED MUNICIPALITIES:

Grants totalling \$1,253.66 were paid to municipalities in aid of municipal drainage in the following amounts: ALGOMA: Laird Township, \$80.00; PARRY SOUND: North Himsworth Township, \$534.16; RENFREW: Alice and Fraser Township, \$493.50; SIMCOE: Medonte Township, \$146.00.

#### 3. ROADS SECTION

#### SUMMARY:

New construction, repair and improvement work on roads, parking areas, sidewalks, curbs, etc., involved an expenditure of \$200,000.00. The projects costing more than \$5,000.00 each are listed below.

#### DEPARTMENT OF AGRICULTURE

Kemptville Agricultural School: new road and improving of existing roads, \$10,400.74. Ridgetown Western Ontario Agricultural College: road paving, \$17.093.53.

#### DEPARTMENT OF THE ATTORNEY GENERAL

Gravenhurst Ontario Fire College: road and parking paving, \$13,446.50.

#### DEPARTMENT OF EDUCATION

London Teachers' College: an 80-car parking lot, \$6,331.34.

#### DEPARTMENT OF HEALTH

Brockville Ontario Hospital: road and parking paving, \$13,894.90. Cedar Springs Ontario Hospital School: road paving, \$11,074.89, and two concrete play areas, \$15,593.64. North Bay Ontario Hospital: an asphalt coal dump and an ambulance entrance, \$9,160.12. St. Thomas Ontario Hospital: two asphalt parking lots, \$8,466.39. Woodstock Ontario Hospital: a parking lot and roads resurfaced, \$10,307.05. Ontario Hospital Services Commission Building, 2221 Yonge Street, Toronto: a gravel parking lot, \$7,666.03.

#### DEPARTMENT OF REFORM INSTITUTIONS

Guelph Ontario Reformatory: courtyard concreted, \$7,441.00.

#### 4. LANDSCAPING SECTION

Major landscaping work was carried out at the Ontario Hospitals at Brockville, Smiths Falls and 999 Queen Street West, Toronto: and further grading, seeding and sodding was carried out at the Ontario Hospital School, Cedar Springs. In addition to substantial landscaping at the Girls' Training School, Lindsay, and the Boys' Training School, Cobourg, there were many smaller jobs carried out throughout the Province.

Respectfully submitted,

W. Z. Rice

W. L. Rice, P.Eng. Chief of the Civil Engineering Division.

# Report of the Chief of the Sanitary Engineering Division

Parliament Buildings, Toronto, Ontario, March 31, 1963.

MR. J. D. MILLAR,
Deputy Minister,
Department of Public Works.

During the year all of the existing sanitary installations, which consist of waterworks systems, sanitary and storm sewers, sewage treatment plants, pumping stations, etc., at the various hospitals, schools and other institutions throughout the Province, were maintained in good operating condition.

At the Ontario Hospital, Hamilton, a second 8 inch cast iron water service was installed from the City of Hamilton 12 inch watermain on Fennel Avenue. The new service is inter-connected to the Hospital mains and the reservoir. This will assure continuous water service to the Hospital and improve the water supply from the standpoint of fire protection.

At the Ontario Hospital, Whitby, the existing sanitary sewage pumping station, which was old and had deteriorated, was replaced by a new modern pumping station with larger capacity pumping units. The station was designed and constructed of sufficient capacity to serve the new School of Nursing building.

At the Ontario Police College, Aylmer, which was formerly a Royal Canadian Air Force Station, extensive revisions and repairs were made to the waterworks system, the sanitary sewers and the sewage treatment plant, so that these services would be suitable to the new requirements.

At the Ontario Fire College, Gravenhurst, two 8 inch cast iron pipe water intakes were constructed out into Lake Muskoka to improve the conditions with respect to the instruction of fire fighting at the college.

At the Federated Colleges, Guelph, the section of the storm water sewerage system serving the Dairy Building, Dairy Barn, Nutrition Building and Poultry Section was reconstructed because old sewers in this area had become inadequate.

The final section of the 8 inch cast iron watermain loop around the College was completed. This is the section of main located on the street at the rear of the Administrative Building extending from College Avenue to College Lane. The installation of this main improves both the domestic and fire flows.

During the reconstruction of the intersection of College Avenue and Highway No. 6, which is the main entrance to the Colleges, the watermains, meter chamber and sewers that conflicted with the work, were re-located.

At the Arkell Farm, which is operated by the Agricultural College, the watermains were extended and hydrants added to provide fire protection to all the buildings.

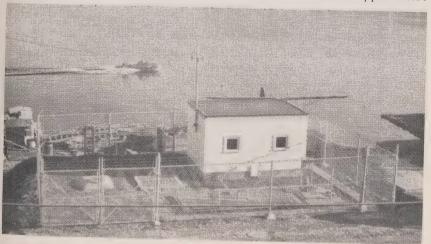
During the year four elevated water storage tanks, at various locations throughout the Province, were cleaned and repainted. The elevated tank at the Ontario Hospital farm St. Thomas, was dismantled. This tank is no longer required since the Hospital water distribution system was extended to serve the farm buildings.

During the past year 20 patrol garages were constructed for the Department of Highways, four new Provincial Police Detachments, a Seed Extraction Plant building for the Department of Lands and Forests at Angus, an Institute of Technology at Kirkland Lake, a Vocational building at the Ontario School for the Deaf at Belleville and a Breeders building at the Federated Colleges at Guelph, etc. In each case services were provided to suit the respective requirements.

# CONSTRUCTION PROJECTS COMPLETED DURING THE YEAR

# ONTARIO GOVERNMENT BRANCH OFFICE BUILDINGS:

At Red Lake, a prefabricated steel package sewage treatment plant of the total oxidation type, capable of treating 2,500 Imperial gallons per 24 hours was completed and put in operation. The plant is located on the opposite side



The new Sewage Treatment Plant, Ontario Government building, Red Lake.

of Howey Street, adjacent to Red Lake and the chlorinated effluent is discharged into the lake. During the installation of the influent sanitary sewer across Howey Street to the plant, the existing water service and storm sewer were re-laid in the same trench and a heating cable provided to prevent freezing during extreme winter conditions which had previously been experienced with both the water service and the storm sewer.

#### DEPARTMENT OF HEALTH:

At the Psychiatric Research Institute for Children at Byron, the construction of a new complete system of sanitary sewers and including a sewage lift station, to serve several of the buildings in a lower area, has been completed. Also included in this work was a gravity trunk sanitary sewer to convey all the Institute sewage to the Sifton Sewage Treatment Plant. Also incorporated in this construction were extensive revisions and additions to the water distribution system and a second 8 inch cast iron water service from the 12 inch City main on Sanitorium Side Road to assure continuous water service and to improve the fire protection.

#### DEPARTMENT OF HIGHWAYS:

When the City of Stratford extended the sanitary sewer on Huron Street to the City limits, it was possible to eliminate the sewage disposal at all the District No. 3 buildings which had been effected by means of two large septic tanks, each with a disposal field.

#### DEPARTMENT OF LANDS AND FORESTS:

The new sewage system at the Forest Ranger School, Dorset, has just been completed and placed in operation. This system serves the whole School and was planned to provide also for expansion. The new works consists of a system of gravity sewers, a small sewage pumping station and a total oxidation sewage treatment plant capable of serving a population of 250 persons. The chlorinated effluent from the treatment plant is carried a distance of 700 feet, out into Lake St. Nora at which point a depth of sixty feet was obtained.

The new water works system at the Southern Research Station, Maple, was completed and put in operation early in the year. The main source of water supply is from the new large capacity well which was completed a year ago. The two existing wells are also used.

The waterworks consists of a complete new system of cast iron mains with all necessary fire hydrants and isolating valves, a 50,000 Imperial gallon elevated steel water tank, an underground reinforced concrete reservoir with water treatment plant for iron removal and a booster pumping station. The waterworks provides an ample supply for all domestic, fire and fish research requirements as for future planned expansion.



Elevated steel tank for the Water Treatment Plant, Southern Research Station, Maple.



Interior of new Water Treatment Plant, Southern Research Station, Maple.

Also at the Southern Research Station, Maple, a new sanitary sewage system was constructed and placed in operation in December 1962. The buildings had been served by individual septic tanks but this became unsatisfactory.

The new sewerage system is made up of a system of gravity sewers and a sewage treatment plant from which the chlorinated effluent discharges into the Little Don River which flows through the station property. The plant is a prefabricated steel unit of the extended aeration type capable of treating 7,500 Imperial gallons per day. The plant was originally in service at the Ontario Government Building, Lindsay, where it became surplus when Town sewers were extended.

At the Ramsay Lake Air Base, Sudbury, the three residences in the past were served by separate septic tanks and disposal beds. Collector sewers were constructed to convey the sewage from the three residences to the sewage pumping station owned by the Sudbury Algoma Sanitorium which discharges into the City sewerage system.

More than 300,000 persons, 43,000 of these being campers, visited Sibbald Point Provincial Park on Lake Simcoe last year. This popularity overtaxed the sewage system which had been based on separate septic tanks and disposal beds for each comfort station. This resulted in the Department of Health ordering the closing of the beach area comfort stations. In order to overcome this problem, it was decided to construct a sewage lagoon. The disposal system

was divided into two stages. Stage-I includes the three acre lagoon, the outfall sewer and related works. Stage-I was completed this year, construction having commenced in October 1962. Stage-II includes the converting of the existing septic tanks into sewage lift stations, each with a suitably sized submergible sewage pump and provided with a force main to deliver the sewage from each respective lift station to the sewage lagoon. This portion of the work will be commenced as soon as weather conditions permit in the Spring and will be completed in early summer, prior to the holiday season. The construction of the above system will completely eliminate the problem of pollution of the beach.

At the Chief Ranger's Headquarters, Sioux Lookout, a new waterworks system was constructed and placed in operation. The water source is the adjacent Lake Abram. A 12 inch cast iron intake extending 250 feet into the lake at a depth of 12 feet conveys the water to a concrete wet well on the shore, over which the pumphouse has been constructed. The pumphouse is equipped with electrically driven domestic service pumps, a gasoline engine driven fire pump, a 500 Imperial gallon hydro-pneumatic pressure tank and chlorination equipment. A system of 6 inch and 8 inch cast iron watermains provides all of the buildings and residences with ample water for domestic use. Fire hydrants provide adequate fire protection at all times.

At the Tree Nursery, Swastika, an underground irrigation system was constructed and completed in time to irrigate an area of 400 acres during the summer of 1962. The installation is comprised of 7,500 lineal feet of 8 inch asbestos cement pipe and eleven concrete outlet manholes to provide for connections of aluminum pipe, laid overland.

During the year, at various locations throughout the Province, 18 deep wells were drilled, developed and brought into production. Thirteen of these wells were of medium capacity, i.e. with a production of from four to 40 Imperial gallons per minute and two of these, which are at the new Ontario Hospital at Palmerston, had a production of 225 Imperial gallons per minute. At each medium capacity well a suitable automatic pressure system was supplied and installed. For the larger wells, a suitable turbine type deep well pump was in-

stalled and placed in service except at Palmerston, where the installations will be made this coming summer. In addition to the above drilling, two existing wells were repaired and test drilling was carried out at the Industrial Farm, Fort William, and for the Department of Lands and Forests at Angus.

A complete site survey was carried out from which a site plan was prepared showing all buildings, roads, walks, fences, manholes, fire hydrants, etc., and all underground services at the Department of Lands and Forests, Gogama. The survey, commenced last year at the Ontario Agricultural College, Guelph, was completed and a survey was also made at the Arkell Farm, which is operated by the College. In addition, a re-survey was made at the Ontario Reformatory, Guelph, and a contour survey of the Federated Colleges farm lands.

Respectfully submitted,

H. E. Bushlen, P. Eng.,

Chief of the Sanitary Engineering Division.

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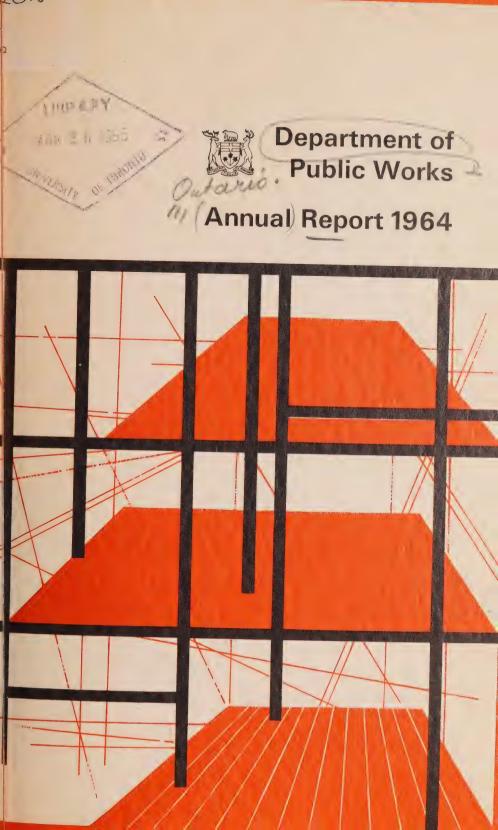
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# Report of the Minister of Public Works

**Province of Ontario** 

For the Year Ending March 31, 1964



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THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE WILLIAM EARL ROWE, P.C.(C)

Lieutenant-Governor of the Province of Ontario.

#### YOUR HONOUR:

The undersigned has the privilege of submitting for the information of Your Honour and the Legislative Assembly, the Annual Report of the works under the control of the Public Works Department, comprising the report of the Deputy Minister, for the 12 months ending the 31st of March, 1964.

Ay Connell
MINISTER OF PUBLIC WORKS

Department of Public Works, Toronto, March 31, 1964. THE HONOURABLE RAY CONNELL,
Minister of Public Works,
Parliament Buildings,
Toronto, Ontario.

#### STR:

I have the honour to submit to you my General Summary together with the reports of the Chiefs of the Architects' Branch, the Real Estate Branch, the Accounts Branch, the Civil Engineering Division and the Sanitary Engineering Division, for the fiscal year April 1, 1963 to March 31, 1964.

At this time, I wish to express my sincere appreciation and thanks for your unremitting patience when dealing with all matters pertaining to departmental administration. I also want to thank the staff of the Department of Public Works for their continued co-operation and assistance in carrying forward another large construction program.

I have the honour to be, Sir,

Your obedient servant,

J. D. Willer
DEPUTY MINISTER OF PUBLIC WORKS.

Toronto, March 31, 1964.

# Summary by the Deputy Minister

The most critical problem facing the Department of Public Works continues to be the housing of the offices of the various departments of government in the Metro Toronto area. Pending the provision of new space in the Queen's Park Project, short-term leases have been entered into to house sections of various departments and, in the case of the Department of Education, to re-locate the greater part of the department in leased premises.

As the population continues to grow, and the services provided to the public through new legislation continue to expand, it becomes evident that the Queen's Park Project will be virtually fully occupied as soon as it is ready. There has never been any intention to bring the Department of Highways back to Queen's Park from its extensive facilities at Downsview. The next stage in our planning is to determine what sections of departments, or complete departments, might eventually find their home outside the Queen's Park area.

Hemmed in as we are on the west and north by the University of Toronto, and on the south by hospital developments, the government can only expand eastward. Here we encounter high real estate prices and must reach a decision based on economics and service to the public as to how far we should go. In any event, the time is coming when there will not be room for all departments to be housed contiguous to Queen's Park, and preliminary thinking must be done on some degree of dispersal.

Detail work on planning for the big Queen's Park Project was carried forward during the past fiscal year by the Associated Architects for Queen's Park Project — a firm composed of staff from Gordon S. Adamson & Associates, Allward & Gouinlock, Mathers & Haldenby and Shore & Moffat & Partners — four of Toronto's leading architectural firms.

We have now reached the point where we expect tender call for the first stage of construction in the early Fall of 1964. This first stage, estimated at \$27,000,000, will consist of a 14-storey Northwest Tower, an 11-storey Southwest Tower, the two-storey central core and two levels of underground parking. This phase should be completed early in 1967. Consulting engineers are H. H. Angus & Associates (mechanical); C. D. Carruthers & Wallace Consultants Limited, (structural); and R. P. Allsop & Associates (electrical).

Our original plans called for a new power plant to be built on the east side of Surrey Place to combine with the stack inside the 230-foot East Block tower. However, our mechanical engineers, after much study, devised a plan which eliminated construction of this expensive new plant and thus made



Last stage demolition for Queen's Park Project

available for other purposes about 30,000 square feet of floor area. We have converted our boilers from coal to gas and oil firing and in the process practically eliminated smoke pollution — for which we have been severely criticized in the past — and effected a fuel economy as well. I might also add that we now use a 100 per cent Canadian product instead of a previous 100 per cent American coal. All of this has meant an estimated saving of \$2 million.

Existing outside services were totally inadequate for the new complex. A new system of watermains and a new combined system of sanitary and storm sewers, with manholes at proper locations, was constructed. Connections for the East Block and the proposed complex were provided to tie-in with future services as the project progresses.

Relocation and removal of electrical services on, or under, what will be the closed areas of Breadalbane and Surrey Place in the immediate Queen's Park area is necessary. The present high tension underground power cable to the East Block on Surrey Place will be re-routed along Grosvenor Street, north on Queen's Park Crescent and enter the East Block from the west. Bell Telephone cables along Surrey Place will be moved laterally to the west and dropped to a lower elevation to conform with structural requirements of the new project. Overhead services such as street lighting, power lines, telephone and signal circuits on Surrey Place and Breadalbane Street will also be removed.

In addition, the new extension to the Treasury Building has just been tendered and work will be starting soon.

The largest renovation program of the old Parliament Building since its completion in 1893 is currently in progress. This involves moving the Department of Education, the Department of the Civil Service and the Queen's Printer from their quarters in this building. It also provides for moving the Provincial Secretary's Department to the North Wing.

The ultimate purpose for this is to free most of the South Wing for legislative purposes. When this renovation is completed it will permit the allocation of better facilities for private members and for cabinet ministers whose departments have been moved out of the immediate Queen's Park area.

Outside Metro the Department's major works are now in the field of Education. We are completing the multi-million dollar Ryerson Polytechnical Institute and have made considerable progress on construction of the Eastern Ontario Institute of Technology at Ottawa and Provincial Institutes of Trades at Ottawa, London and Sault Ste. Marie. In advanced planning is a College of Education at London and a huge Technical Training Centre at Hamilton.



Superimposed aerial view shows how Queen's Park Project will look when finished



Perspective of the proposed Treasury Building Extension

# Report of the Chief of the Architects' Branch

MR. J. D. MILLAR,
Deputy Minister of Public Works,
Parliament Buildings,
Toronto, Ontario.

DEAR SIR .

I have the honour to report on the work accomplished by the Architects' Branch of the Department of Public Works, Ontario, during the fiscal year April 1, 1963, to March 31, 1964.

Approximately \$214,000,000 in building projects are either under construction or in some stage of planning. Of this sum, about \$174,000,000 is under construction. This includes items for which approval has been given. Looming large in our planning has been the Queen's Park Development Complex which has necessitated an extensive program of redevelopment of outside services at Queen's Park.

Large projects were completed for various departments of the government and others are in various stages of construction which are mentioned in detail in the following report.

# LEGISLATIVE AND DEPARTMENTAL BUILDINGS

Early in February, 1964, tenders for a seven-storey addition to the Ontario Government Treasury Building, estimated at \$4 million, were called.

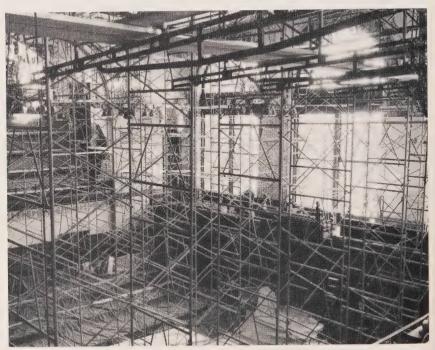
The Treasury addition will be crescent-shaped and will sit on a gray granite terrace extending along the front and south sides of the buildings. It will be joined to the existing building by bridge-corridors on floors from two to six. It will be faced with Queenston limestone to conform with the existing Treasury Building and the East Block. For decorative effect, the south elevation looking down University Avenue will have a balcony to each floor dressed in green granite. The penthouse will be completely clad in stainless steel.

Pedestrian tunnels will run under the terrace on the west side of the building for some 250 feet. The tunnel will lead from the TTC subway station at College Street to connect with the new addition's basement where there will be an escalator and stairway arrangement. It will connect with a future tunnel under Grosvenor Street to the East Block basement and the new Queen's Park development, and by existing tunnel from the East Block to the main Parliament Buildings.

There will be two-level parking facilities at basement and ground levels at the rear of the building approached by ramp from Grosvenor Street and from Surrey Place Street level. A staircase and elevator will ascend to the main entrance hall which will be serviced by four passenger elevators.

The new structure will be about 300 by 62 feet and rise about 100 feet above the terrace. It will have reinforced concrete frames and floors will feature deeply recessed double-glazed windows for complete air conditioning. All floors are planned for open space and there will be few ceiling height partitions. The second floor will be used for data processing. The first floor will feature columns of green granite and panels of white marble.

At the Main Parliament Buildings, the Legislative Chamber underwent extensive alterations and renovations. This involved repairs to plaster, seating and upholstery; renewal of floor covering in two galleries, the provision of exhaust ventilation, painting and replacement of drapes. The grand staircase, corridors and foyer were also redecorated. The legislative recording system was completed. New offices for the Official Opposition are now being established in rooms 115 to 122. Alterations were made to the office of the Attorney General including the intercom system. The present floodlighting



Scaffolding for extensive redecoration and renovation of the Legislative Chamber

system was extended at the front of the building. In the North Wing extensive alterations to provide a new home for the Department of the Provincial Secretary are in progress.

In the East Block, work began on the demolition of #1, #2 and #3 boilers in preparation for installation of newer and more efficient equipment that will increase the steam generation for the Queen's Park area. The existing coal bunker was converted for oil storage standby and gas firing, with the work being done partly by contract and partly by DPW forces. This involves certain works in connection with the new Queen's Park Complex — sewers, watermains and structural conditions affecting the size of the existing coal storage area. Preparations were also under way for re-routing the 4.16 K.V. feeder to the East Block. A new telephone equipment room was created on the sixth floor to provide additional automatic telephone equipment.

Routine maintenance, alterations and renovation work were carried out, as necessary, in all Metropolitan Toronto governmental office locations.

## ONTARIO GOVERNMENT BRANCH OFFICE BUILDINGS

Maintenance was carried out at Elk Lake, Kemptville, Lindsay, Matheson, Red Lake, Sault Ste. Marie and Sioux Lookout.

# DEPARTMENT OF PUBLIC WORKS REGIONAL BUILDINGS

Routine repairs and alteration work were done at Huntsville, Mimico, North Bay, Port Arthur and Sudbury (McFarlane Lake).

# For The Department of Agriculture

At the Guelph Federated Colleges, the Breeders' Service Building, which had reached 35 per cent completion at the end of the previous fiscal year, is finished. The building was erected by the Department of Public Works and will be operated by the Ontario Department of Agriculture, through the Department of Animal Husbandry. Actual building costs are borne by the Ontario Association of Artificial Breeders. A. Battaglia Construction Co. Limited of Guelph, were the contractors and T. Allan Sage, also of Guelph, was the associate architect on the project. The job was contracted for \$171,000.

The 150 by 53-foot building consists of a single floor with full basement. It is equipped with facilities for processing semen for shipment anywhere. It will also provide facilities for continuing studies in artificial breeding techniques, and services for all types of livestock.

Provision has been made for four offices, laboratories for research, processing and preparation, two special examination rooms, five cold rooms, a storage room and shipping area on the first floor. In addition, space is



The new Breeders' Service Building, Federated Colleges, Guelph

provided for a secretary manager and staff of the Ontario Association of Artificial Breeders. The basement level has a stockroom, mechanical and electrical room, conference room, instructional area and locker rooms for employees.

The service portion of the building is used for routine freezing and storage of semen both for private individuals and for the Ontario Association of



Operating the water still, preparation area, Breeders' Service Building



Low temperature frozen semen storage, storage and shipping area, Breeders' Service Building

Artificial Breeders. It is interesting to note that first experiments in the preservation of semen at low temperatures were conducted in a small laboratory located in the main building of the O.V.C. With the apparent success of this technique, the operation was later moved to temporary quarters in a converted army hut, then to new facilities in the Medical-Surgical wing of the Ontario Veterinary College. Expanded demands for this service by livestock breeders and consequent overtaxing of existing facilities at the Medical-Surgical building led to negotiations and eventual construction of the Breeder's Service building.

The pathogen-free pig unit, which was under construction and nearing completion last year at the Veterinary College, is now completed. This project, costing \$92,363, was carried forward in two sections and was contracted to Len Ariss & Company Ltd. of Guelph. The buildings will be used for experimental purposes to improve the breeding of pigs.

Building is continuing on two major contracts totalling \$4,509,572.00. In May, 1963, a \$1,354,872.00 contract was awarded to Ball Bros. Limited, Kitchener contractors, to build a Poultry, Pathology and Virus Research



New method of delivering new-born piglets at the new pathogen-free pig unit

Institute building at the Ontario Veterinary College. Eighteen companies tendered for this job. In June, 1963, a \$3,154,700.00 contract went to Dunker Construction Ltd., also of Kitchener, for the new Chemistry and Microbiology building to add to the Science Buildings Group.

The Poultry, Pathology and Virus Research Institute has been designed to serve the expanding poultry and livestock industry of Ontario through research into the causes and control of infectious diseases. Until now, poultry virology and wildlife disease laboratories have been housed in six temporary locations at Guelph. The new building will co-ordinate these facilities under one roof. Work is well advanced at 72 per cent.

The "T"-shaped, split level plan comprising 50,000 square feet of floor space will provide accommodation for three separate research divisions — poultry and pathology, virology and wildlife diseases with ancillary facilities for these divisions in the electron microscopy laboratory, and the animal isolation wing.

The Poultry and Pathology division will contain large and small autopsy rooms and laboratories for bacteriology, media preparation, histology, serology as well as a graduates' laboratory, cold rooms, offices and incinerator.

Contained in the Virology section will be a post mortem room, a glass sterilization area, laboratories for tissue culture, virology, serology, bio-



Poultry, Pathology and Virus Research Institute, Federated Colleges, Guelph

chemistry, media preparation, five post graduate laboratories, incubators and offices.

The large Isolation Wing, 130 by 105 feet, will have 26 isolation rooms, a large post mortem room, five laboratories, four horsfall rooms and adjoining examination rooms, feed kitchen, dirty cage washup, cold room and ancillary facilities. In this wing, infectious diseases of all species of domestic and laboratory animals can be studied in strict isolation one from the other.

The laboratories will provide suitable quarters for the training of graduate students in the various fields of microbiology and permit research on diseases of fur-bearing animals and wild birds which are transmissible to man, poultry and livestock.

Dunker Construction Ltd. of Kitchener are well advanced on the Chemistry and Microbiology building — the third major science building to be erected in half a dozen years. Previously, a Soils building was constructed in 1958 and a new Biology building in 1960. William R. Souter and Associates are associate architects on the project. Provincial Highway No. 6 is on the southwest side and College Lane on the southeast.

General accommodation will provide lecture rooms, special purpose rooms, many teaching and research laboratories, multi-purpose rooms, offices, a 300-seat lecture theatre centrally located on the first floor, a library



Chemistry and Microbiology Building, Federated Colleges, Guelph



The new powerhouse, Kemptville Agricultural School

on the ground floor under the lecture theatre, several smaller lecture theatres, as well as space for service and storage. A "U"-shaped plan was adopted to limit frontage, to permit future ready expansion and to simplify a division of departments.

Extensive other work was carried forward at this college. At the O.A.C. sector, a steel storage building was constructed and a new potting shed built at the Horticulture Soils building; the old refrigerator laboratory at the Engineering Science building was renovated into offices; three growth chambers were installed at the Field Husbandry Research building; considerable renovation work was done at Creelman Hall, McDonald Institute and the post office and a new passenger elevator installed at the Field Husbandry building. Also well advanced were an addition to the Physical Education building and a dry sow barn at the Arkell Farm. At the O.V.C. section, conversion of rooms at the Small Animal surgery for use as physiological sciences with special laboratory equipment is essentially completed. At the main building the passenger elevator was renovated.

The new powerhouse for the Kemptville Agricultural School was substantially completed in March, 1963. Interior work progressed during the year and the plant was completed in October and placed in service the following month.

Minor work was done at the New Liskeard Demonstration Farm. Farquhar Construction Co. Limited, North Bay contractors, were awarded a \$15,608 general trades contract in January, 1964, to erect a 44 by 86-foot sheep barn.

### For The

# Department of the Attorney General ONTARIO PROVINCIAL POLICE BUILDINGS

At the close of the previous year, six detachment buildings were under construction at a total cost of \$627,328. Locations were Atikokan, Emo, Kapuskasing, Manitouwadge, Powassan and Sombra. Construction and occupation of all six projects was completed before the end of the calendar year.

Four additional contracts with a total contract value of \$505,810 were awarded in 1963 to build detachment buildings at Goderich, Thessalon, Wawa and White River. Details are as follows:

Goderich — Zurich Hardware & Builders Supply Ltd. of Zurich were awarded a \$189,900 general trades contract in August 1963 to build a detachment building at Goderich. Seven firms bid this job. Construction began in September and had reached 86 per cent at the close of the fiscal year. The new police building is being erected on No. 21 Highway, three miles south of the town, on land declared surplus after construction of the Ontario Hospital. The building is one-storey with basement and contains a large general office, interrogation and radio rooms, offices for the sergeant, corporal and secretaries, vaults, washrooms and a cell block divided into male and female divisions. A separate four-car garage is included in the project. Completion is expected in April-May, 1964.



The new O.P.P. detachment building, Kapuskasing



The new O.P.P. detachment building, nearing completion, Goderich

Thessalon — Tenders were called in June, 1963, for a new detachment building to be built on a site at the entrance to Thessalon on Highway No. 17, near Boyle St. Four contractors bid for the job which was awarded to the low bidder — George Stone & Sons Ltd., Sault Ste. Marie — at a contract price of \$119,997. The building is single storey and of brick construction. Living quarters for the senior constable's family are at one end. The basement is under this area only. The remainder of the building is administrative and includes a large general office, offices for the senior officer and radio operator, a courtroom, a changing room with private washroom, two male and two female cells, and public washrooms. The project was started in September 1963 and had reached 84 per cent by March 1964.

Wawa — Tenders for a new detachment building at Wawa were called in March, 1963. The contract for erection of this building went to Gartshore Construction Co. Limited, Sault Ste. Marie, at a contract price of \$102,200. This was the lowest of five firms bidding for the project. The job was 77 per cent completed at the end of March 1964. The site is about two miles west of Wawa, near the junction of the road leading into Wawa at Highway 17. Construction of this 167 by 34-foot building is of concrete and red facing brick with roof of asphalt shingles. It is single-storey with partial basement divided into two sections — administrative and living quarters. The 75 by 34-foot administrative section has a courtroom; a magistrate's room with private washroom; a large general office; offices for the senior constable and radio officers; two male and two female cells and public washrooms. A sixroom apartment comprises the living quarters. The basement is under the living quarters only. A four-car garage is included.

White River — A \$93,713 general trades contract to build a detachment building for the Ontario Provincial Police at White River was awarded in September, 1963, to M. Cebrario & Sons Ltd., of Schreiber — the lowest of four bidding for the job. The new detachment will be built on Department of Highways property on the outskirts of White River on Highway 17. The

building will be about 113 feet by 51 feet, divided into administrative and living quarters areas. The administrative side will have a large office, male and female cells, vault, washroom facilities and two-car garage. A three-bedroom residence will comprise the living quarters.

Nearing tender call were detachment buildings for Dutton, Guelph, Longlac, Marathon and Napanee. Also, in the advanced planning stage are district headquarters' buildings for Toronto (Downsview), Mount Forest, Peterborough and Timmins.



Advanced construction of the new O.P.P. detachment building, Manitouwadge

### COURTHOUSES AND REGISTRY OFFICES

Renovations and alterations were carried forward at a number of Courthouse and Registry Office buildings. A \$148,000 renovation program by Department of Public Works forces at the Sault Ste. Marie Courthouse is about 70 per cent done. Renovation to the interior of the Gore Bay Registry Office is nearing completion at 95 per cent. Sted's Limited of North Bay were awarded a \$15,600 contract in January, 1964, to construct an addition to the Juvenile and Family Court building. This job has reached 35 per cent completion. A \$43,383 contract was awarded in February, 1964, to Willer Lumber & Builders Supply Ltd. of Fort Frances for additions and alterations to the Fort Frances Courthouse. This project is just under way. At Port Arthur Courthouse, renovation work was carried forward from the previous year to completion. The Registry Office building was also redecorated.

# For The Department of Education

The marked acceleration in building expansion for the Department of Education, so evident the previous year, continued its trend. Major new works totalling almost \$20 million have either been completed or are well under way. Nearing tender call were two projects — a \$3,000,000 College of Education.



Perspective of the proposed Ontario College of Education, London



Perspective, senior boys' dormitory, Ontario School for the Blind, Brantford



Vocational School Building, Ontario School for the Deaf, Belleville

tion at London and a \$300,000 senior boys' dormitory for the Brantford Ontario School for the Blind. Planning for second-stage construction of the Milton School for the Deaf is well advanced.

The big job to be completed was Unit No. 3 of the new building group for Toronto's Ryerson Institute of Technology, now known as Ryerson Polytechnical Institute. Under construction since August, 1961, it was 97 per cent finished at the end of the previous fiscal year. By May, 1963, work had advanced sufficiently to enable the staff to move into the new unit on May 27. Classes were held in August and the cafeteria, gymnasium and auditorium were in operation. On Wednesday, September 11, 1963, Hon. Ray Connell, Minister of Public Works, officially turned over the new building to Hon. William G. Davis, the Minister of Education, at a plaque unveiling ceremony. Throughout the balance of the year work continued on deficiencies, demolition of old buildings to allow space for courtyard and landscaping, and deliveries of furniture and equipment. The project was finished by March, 1964. Perini Construction Limited, Toronto, were the builders at a contract price of \$5,670,000.

The new Vocational School building for the Ontario School for the Deaf at Belleville, contracted to T. A. Andre & Sons Limited, of Kingston, for \$538,700, is essentially finished at 98 per cent with occupation anticipated for April, 1964. It is a single-storey structure of steel, reinforced concrete and brick construction, 210 by 197 feet, located north of the main school building and east of the powerhouse and laundry buildings. A description of the building and its facilities was given in the previous report. A considerable expansion program has been under way at this institution over the past few years, starting in 1957, including a new junior school and students' residence, a staff dormitory, a powerhouse and a new laundry building, all of which were completed in 1959.

Four major contracts amounting to \$12,802,677 were awarded during the year. Three were for Provincial Institutes of Trades at London, Ottawa and Sault Ste. Marie and the fourth for a new Eastern Ontario Institute of Technology at Ottawa.

Pentagon Construction Company of Montreal, was awarded a \$3,174,677 general trades contract to build the new home of the Eastern Ontario Institute of Technology at Ottawa on a 12-acre site at the end of Lees Avenue, near the Queensway, and extending back to the Rideau River. Seventeen contracting firms bid for this job. Burgess, McLean and MacPhayden, Ottawa, are associate architects on the project.

It is a single level building of brick, concrete and steel construction made up of three connecting wings. Initial capacity will be from 600 to 800 students, but the layout of the building is so designed that new capacity can readily be



Gymnasium, Eastern Ontario Institute of Technology, Ottawa



Installation of equipment at machine shop, Eastern Ontario Institute of Technology



View of north side, Eastern Ontario Institute of Technology, Ottawa

added to any area to provide for a normal capacity of over 1,000 students. Total teaching, administration and recreational space is about 130,000 square feet exclusive of the basement boiler room. Adequate parking facilities have been provided as well as a large campus. There will be two lecture theatres, each seating 120 pupils. An auditorium will accommodate 500 persons. Overall construction has reached 70 per cent. The project is expected to be finished in the summer of 1964.

Work on the new Provincial Institute of Trades at Ottawa began early in April when the V. K. Mason Construction Company of Ottawa, was awarded a \$3,538,000 general trades contract. The new school is being built on a 12-acre site facing on Woodroffe Avenue, in Nepean Township, on the farm of Frank Ryan. Eight acres of the site were donated by Mr. Ryan. It will be partly two storey and partly single storey. The day school capacity will be about 600 students.



Southwest corner view of construction at the Ontario Vocational Centre, Ottawa



View of construction at the Ontario Vocational Centre, Ottawa

The two-storey section faces Woodruffe Avenue and will contain the main entrance lobby, administrative offices and teaching facilities for the associated academic courses. It also includes the combined gymnasium and auditorium with locker room and other facilities. The single storey section stretches back from the front part and contains the cafeteria and kitchen, and a series of well equipped shops for teaching the various commercial and industrial trades.

Trades to be taught include retailing, barbering, hairdressing, business machine repairs, fine instrument repairs, commercial art, draughting, machine shop work, electrical construction, electronics, dental technology, general science, paper technology, welding, building trades, automotive and light diesel trades, body and fender work and horticulture.

Precast concrete columns and beams are used throughout, with the gymnasium-auditorium and automotive shop having structural steel frames. Floors and roofs are being constructed of precast, pre-stressed concrete units which allows use of broad spans with a minimum of supporting columns In general, masonry materials will be exposed to view. The exterior of the building will be brick with liberal use of windows. Extensive use has been made of glazed concrete block and acoustic tile within the building. The layout is around a central garden court. Electrical services include an integrated closed circuit television and radio system. Heating has been designed on the basis of a dual-duct high velocity air system, except in the three greenhouses where hot water radiation will be used. The Ottawa firm of Hazelgrove, Lithwick, Lambert and Sim are associate architects while J. L. Richards and Associates are consulting engineers. The project stands at 55 per cent.

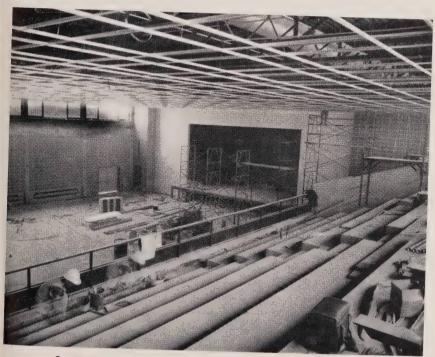
Tenders for a new Provincial Institute of Trades building at London were called in February, 1963. Six major contracting firms bid for the job which went to Foundation Company of Canada Limited, of London, the lowest



Northeast classrooms, Ontario Vocational Centre, London

bidder, at \$3,444,000. The London architectural firm of Blackwell, Hagarty & Buist are associate architects. At the end of the fiscal year this job was 70 per cent done with 124 men employed. It is expected to be completed in late summer.

The school is being built on a 1,000 by 657-foot tract of land on surplus Ontario Hospital property north of Oxford Street, east of Highbury Avenue. It consists of two separate buildings of steel frame and masonry construction linked together by an underground tunnel.



Construction of auditorium at Ontario Vocational Centre, London

The main 400 by 300-foot building is a single-storey administration, gymnasium and general workshops section and a two-storey classroom wing. The central core comprises the administration area. There is an open court complete with attractive plantings, sculpture and benches to the rear of this. A large cafeteria, kitchen, staff dining room, teachers' lounge and attendant washroom facilities are adjacent. The gymnasium-auditorium with stage—and locker room areas for both men and women— is located on the other side of the court.

The two-storey classroom wing contains seven classrooms, a hairdressing salon, library, workroom and printing section as well as space for general storage on the first floor. Above, on the second floor, are 13 classrooms and laboratories specializing in science, draughting and commercial services, in addition to space for blueprint and laboratory storage.

Large shops for machine work, plumbing, sheet metal, carpentry, welding, electronics and electrical construction are contained in the single-storey section at the rear.

The second 350 by 100-foot building is mostly single storey. The main core will be devoted to heavy duty auto and diesel repair and house shops for machine work, auto transmission, carburetor ignition, diesel injection tests and repairs and diesel engines. There will be storage for parts and an office. A two-storey section over the workshops at the rear of the building will contain classrooms, washrooms, showers and a lunchroom. A wing on the west side provides extensive facilities for spray painting. Plans provide parking for 250 cars.

The Foundation Company of Canada, Sudbury Unit, was awarded a \$2,646,000 general trades contract in November, 1963, to build a new Pro-



Perspective of Ontario Vocational Centre, Sault Ste. Marie

vincial Institute of Trades at Sault Ste. Marie. This was the lowest tender submitted by eight major firms bidding for the job.

The project for Sault Ste. Marie consists of three distinct but interconnected main buildings located at Northern and Willow Avenues, near the newly built Highways' district repair garage and 18-bay heated storage building. The total complex will have a floor area of 160,000 square feet with accommodation for about 600 students. It comprises a basement and two floors classroom wing and single-storey shops and heavy equipment wings. Parking for 100 cars is provided.

Construction began on November 26th, 1963. In addition to the buildings, the project includes walks, driveways, parking lot, finish grading and land-scaping. Construction of the buildings is reinforced concrete footings and foundation walls, concrete slabs, steel frame, masonry walls and built-up roofing. The project was 12 per cent completed at the end of March, 1964.

# For The Department of Health

Finishing touches to \$3,486,407 in major works carried over from the previous year were made; an additional \$14,661,749 in contracts was awarded for new construction on three large projects and planning for the establishment of three mental institutions is on the drawing boards.

The new School of Nursing for the Whitby Ontario Hospital, which was built at a contract price of \$993,407 by Newman Bros. of St. Catharines, was completed in April, 1963, and finished and equipped during succeeding months. Official opening ceremonies were held on September 12, 1963, when Public Works Minister Ray Connell presented the key to the building and joined with Hon. Matthew B. Dymond, Minister of Health, in unveiling a commemorative plaque. Work on this project began on March 6, 1962.

Construction of the 300-bed pavilion, laundry and trades buildings with connecting tunnels at the Ontario Hospital School, Orillia, had reached 97 per cent at the close of the previous fiscal year. On September 18, 1963, Hon. Ray Connell, Minister of Public Works, officially opened the new patients' pavilion at this hospital when he presented the key to the building to Hon. Matthew B. Dymond, Minister of Health. The building has been named the the Doctor Bernard T. McGhie Pavilion.

First-stage construction of the new mental hospital at Palmerston comprising the power, trades and garage buildings had reached 93 per cent completion at the close of the 1962-63 fiscal year. The project, contracted to Anglin-Norcross (Ontario), Limited, of Toronto, for \$490,000, was started in May, 1962 and completed during the summer of 1963.



Aerial view of second-stage construction at the new Ontario Hospital, Palmerston
(1) Hydro sub-station; (2) garage; (3) maintenance building; (4) boiler room; (5) ex-

(1) Hydro sub-station; (2) garage; (3) maintenance building; (4) boiler room; (5) exposed sidewalk — actually top of concrete tunnel, which will be buried when grounds landscaped; (6) front entrance to reception area; (7) administration and reception centre; (8) the two '8's' are over business administration offices. Enclosed open courtyard is between; (9) chapel; (10) auditorium; (11) service wing; (12) corridor leading from kitchen to dining area; (13) dining area. (A to F) are wards each accommodating 50 patients.

A general trades contract for the second-stage of construction was awarded to Ellis-Don Limited, London contracting firm, for \$3,625,949 in May, 1963. Thirteen firms bid for the job. The second stage consists of six pavilions, a service wing and administration section with connecting tunnels and corridors. The initial bed capacity will be 240 but provision is made in the plans for future expansion. It is expected that both female and male patients will be admitted to this hospital mainly for ambulatory cases, but some provision has been made for patients requiring bed care.

All of the buildings will be one-storey. Four of the basements will have large recreational areas. There will be no corridors with the exception of the central service core. Each pavilion will have partitioned dormitories with big day rooms and sun terraces. Buildings will be completely radiant heated with ventilation in the ceilings.

The service wing will contain the kitchen and dining area, hospital stores, occupational therapy, a four-classroom school and a large gymnasium and auditorium. The administration wing incorporates the main entrance and hall, staff entrance, patients' admittance, office and chapels. All construction will be poured and pre-cast concrete with brick panels and the roof of pre-stressed and pre-cast concrete. Floors will be mostly terrazzo and resilient tile.

The water supply will be derived from two big wells on the site; a seven-acre lagoon will take care of sewage disposal; power will be supplied by hydro; a television tower is also included in the project with underground cables to service recreation rooms and all pavilions. There will be parking for 75 staff and 70 visitors, both expandable if necessary. Work on the project began in May, 1963, and has advanced to 60 per cent.

Tenders for the new Toronto Psychiatric Institute were called in July, 1963, and resulted in Pigott Construction Company of Toronto, receiving a \$6,663,800 contract. Construction began on October 30 and has advanced to 11 per cent with work concentrated on the tower building. The job consists of a 14-storey tower and connected three-storey research wing and has been designed to accommodate 204 beds. The site is at College and Huron Streets, near the west campus of the University of Toronto. The building will be entirely of reinforced concrete, with the exception of the roof over the large lecture room which will be spanned in steel.

Basic research will be carried out as part of the Institute's program on the first and second floors of the north wing such as constitutional psychiatry, genetics and emidemology, social and behavioural sciences, psychology and communications, neuroanatomy, neurophysiology, psychophysiology, psychopharmacy, and biochemistry.

There will be four typical floors of 33 beds at seventh, ninth, tenth and eleventh floor levels. At the fifth floor level there will be 21 beds in an emergency consulting service together with eight beds on the north side of the floor for a day care centre and night hostel. The fourth floor will house clinics for the forensic outpatients' service and a 22-bed in-patient service. The third floor will connect with a play terrace on the roof of the north wing to provide a children's in-patients' service with three groups of seven beds each. The main entrance to the research wing from the university campus on the north will serve as the students' entrance for lecture rooms located at the ground floor level. The largest of the four lecture rooms will be equipped with a small stage and projection booth for entertaining patients as well as for lectures and meetings of a public or professional nature. Contained in the basement will be locker rooms for staff, maintenance shops and mechanical equipment rooms, a computation centre, record storage room, occupational



Perspective of Ontario Psychiatric Institute, Toronto

therapy workshop and a small gymnasium. A freight elevator will transport foodstuffs from the central stores at ground floor level to the kitchen and cafeteria at the top of the building. Service ingress and egress will be from College Street on the south through to Spadina Avenue on the west.

The special relationship with the Department of Psychiatry of the University of Toronto School of Medicine will allow the training of psychiatric nurses, psychologists, social workers, occupational therapists, teachers, and others for work in the mental health field. Physicians continuing into the mental health field from the Medical School will undertake their post graduate training in the new Institute.

Out-patient services, which have grown in the Toronto Psychiatric Hospital through a concentration of facilities there, and which are physically disconnected from the hospital, will now be housed within the Institute. Out-

patients' services for children and adults will be found at ground floor and first floor levels. These services will be readily accessible through their own entrance off Huron Street.

Tenders were called on October 16, 1963, for the new Central Health Laboratory to be built on Highway 401 between the Islington Avenue cloverleaf and the Ontario Water Resources Commission building on the banks of the Humber River. McNamara Construction of Ontario Limited, Toronto, was awarded a general trades contract amounting to \$4,372,000 for the job in November, 1963. This was the lowest of eleven bids.

The new Health Laboratory will be the first permanent home the Central Laboratory will have had since its founding as a public service 75 years ago. The prime function of this laboratory will be to provide comprehensive laboratory service for hospitals and doctors in private practice, independent of other available laboratories, in the Metropolitan Toronto area. In addition, the Central Laboratory will also be the headquarters for a province-wide network of regional government laboratories.

The seven-acre site is rolling grassland with a number of fine elm trees which, it is hoped, will survive to enhance the buildings. The project will



Perspective of Central Health Laboratory, Toronto

consist of a laboratory and an auditorium wing joined by a section containing the main entrance. The laboratory will have a basement, three floors of laboratories, and a large penthouse housing the bulk of the complex air conditioning system. The auditorium wing will have a large garage for shipping and receiving in the basement and, at the first floor level, a 320-seat auditorium, staff lounge and a 200-seat cafeteria with adjacent servery and kitchen. The approximate total floor area is 174,600 square feet.

The laboratory will be sheathed in a screen of glare and heat reducing grey glass. Each laboratory floor will consist of a central working core containing all services surrounded by a perimeter circulation corridor. This corridor will act as an insulator between the outside and the carefully controlled atmospheres of the laboratories. As a foil to the sleek appearance of the laboratory and the link, the auditorium wing will be of rough textured brick with large windows to take advantage of the surrounding fields and trees. Flexibility within the laboratories, whose functions can change from time to time, will be accomplished by employing movable partitions, interchangeable cabinet units and modular service shafts feeding the laboratory benches. Wilson and Newton, Toronto, are associate architects on the project.

# For The Department of Highways

Emphasis on construction for the Department of Highways was mostly confined to completing a large number of metal patrol garages, built to a standard design, that were started the previous year. Seventeen garages costing \$709,702.42 were finished and three contracts amounting to \$120,183 in new construction were awarded. They were:

#### THREE BAYS

UPSALA — (\$39,458 contract). This was 80 per cent finished last year. It was completed and occupied in June, 1963.

WAHNAPITAE — (\$33,300 contract). Construction stood at 94 per cent as of March 31, 1963. It was completed the following May.

#### **FOUR BAYS**

MADAWASKA — (\$37,933 contract). Advanced from 35 per cent as of March, 1963, to completion in November, 1963.

ROSENEATH — (\$35,433 contract). This garage was finished in June, 1963.

BATCHAWANA — (\$39,895 contract). Had reached 30 per cent in March, 1963. Building completed and turned over to Highways July 12, 1963.

- COBDEN (\$34,271 contract). Construction began in April and it was finished at the end of the fiscal year.
- SHELBURNE (\$36,297 contract). This award was made at the end of January, 1963, and completed the following January.

#### FIVE BAYS

- GRAND BEND (\$40,760 contract). Work on this project advanced from 60 per cent to completion on July 16, 1963.
- CRAIGHURST (\$37,956.42 contract). This job continued from 37 per cent to completion and occupation in early June, 1963.
- REECE'S CORNERS (\$39,657 contract). The garage was near completion at the close of the last fiscal year and is now completed.
- SESEKINIKA (\$39,300 contract). Work at this site progressed from 40 per cent in March, 1963, to when it was turned over to Highways in July.
- COURTLAND (\$37,695 contract). The contract was awarded in February, 1963, and completed in mid-December, 1963.

#### SIX BAYS

- CLINTON (\$44,055 contract). This job had advanced to 56 per cent as of March 31, 1963. It was completed July 16, 1963.
- PORQUOIS JUNCTION (\$47,360 contract). Construction continued from 70 per cent to a July 1963, completion.
- HAWKESBURY (\$39,903 contract). Finished in October, 1963.
- CAMDEN EAST (\$53,965 contract). This garage was substantially completed at 98 per cent in March, 1963, and was finally finished in June.

#### ELEVEN BAYS

ST. CATHARINES (HOMER) — (\$72,464 contract). The project was essentially finished at the close of the previous fiscal year, but was held up subject to approval of overhead doors. The keys to the building were turned over to the Department of Highways on July 30, 1963.

### **NEW CONSTRUCTION**

- ORMSBY In November, 1963, a \$37,989 contract was awarded to Welcon Limited, Guelph contractors, to build a four-bay metal patrol garage to standard design at Ormsby. This was the lowest of five bids. The job stands at 65 per cent.
- WHITE RIVER M. Cebrario & Sons Limited, Schreiber, was awarded a \$43,103 general trades contract in September, 1963, for the construction of a five-bay metal patrol garage at White River.

YOUNG'S POINT — In December, 1963, a \$39,091 contract was awarded to Eastwood Construction Company Limited, of Peterborough, for the construction of a five-bay metal patrol garage at Young's Point, about 15 miles north of Peterborough. The project had reached about 60 per cent at the end of March, 1964, and was expected to be finished by May.

Metal patrol garages for Caledon, Camboro, Elk Lake, Erin, Flesherton, Long Sault, McKerrow, Powassan and Verona are planned.

In the planning stages are a regional and district office building for Kingston and a paint shop for Kenora. Two large projects are to be located at Fort William. A district repair garage has been approved and sketch plans for a regional and district office building are on the boards.

Renovation, maintenance and other work was carried forward at Barrie, Blind River, Britt, Cochrane, Emo, Geraldton, Grafton, Haliburton, Huntsville, Kingston, Little Current, Marathon, Mindemoya, North Bay, Ottawa, Shabaqua, Sudbury and Timmins.

# For The Department of Lands and Forests

Six projects at a total contract price of \$711,790 are in various stages of construction for the Department of Lands and Forests. They consist of a new dormitory for the Dorset Forest Ranger School; an office, garage and boathouse at Dunnville; a chief ranger's headquarters' building for McFarlane Lake (Sudbury); a museum for the provincial park at Rondeau; a nursery, office and shipping barn for Swastika Tree Nursery and a chief ranger's office and warehouse for Timagami.



Perspective of new dormitory building for Ontario Forest Ranger School, Dorset

M. Sullivan & Sons Limited, Arnprior contractors, received a \$279,188 contract in November, 1963, to proceed with the construction of a three-storey dormitory building at the Ontario Forest Ranger School at Dorset. Eight bid for the project. The new dormitory accommodating 90 students is being built south of the existing main school building which borders on Lake St. Nola. Construction is of brick, stone and concrete block and shingled to match existing buildings. Accommodation will include seven twin bedrooms on the first floor and 19 twin bedrooms on each of the second and third floors. Also, on the first floor, will be large lecture and common rooms, drying and laundry rooms and staff washrooms. A feature on the second floor will be a large recreation hall and badminton court reaching to third floor height, complete with washrooms and showers. The project stands at 15 per cent.

B. W. McPherson Construction Company, Dunnville contracting firm, was awarded a \$30,885 contract in June, 1963, to build an office, garage stores and boathouse at Dunnville. It will serve as headquarters for the Eastern Division of the Lake Erie District of the Department of Lands and Forests. The project was started in July, 1963, and is essentially completed. The three buildings are of frame construction with the garage and boathouse having aluminum siding. The buildings have been erected on the northern bank of the Grand River. The 40 by 16-foot office building has a general office, supervisor's office and washroom facilities; the 40 by 32-foot garage accommodates two trucks and storage space, while the boathouse has been built on piles and accommodates three boats. It has been equipped with the necessary bracing and equipment to raise a heavy boat from the water.

The chief ranger's headquarters' building at McFarlane Lake (Sudbury) is being erected by Carrington Company Limited, Sudbury, at a contract



Building area for Chief Rangers' Headquarters Building, McFarlane Lake

price of \$195,000. Five firms, four from Sudbury, bid for the job. The award was made early in December, 1963, and construction began on December 10. It is 17 per cent completed. The building is located with government buildings already on the site which is known as "Little Queen's Park," seven miles southwest of Sudbury. Buildings for the Department of Public Works, Transport and Highways are already located there and provision has been made for future construction of a Sudbury district O.P.P. headquarters.

The single storey headquarters, 185 by 110 feet, will be divided into administrative and vehicle storage and repair areas. The administration section will contain a large general office and public space, an office for the chief ranger, meeting room, biology laboratory, washrooms, and a section for radio repairs. The storage repair garage will be contained in a 143 by 74 feet area. Construction will be of faced brick and concrete block backup, reinforced concrete foundation and floors of concrete slab on grade. The roof will have steel decking on steel joists with built-up roofing. Interior partitions will be concrete block and windows steel sash. The meeting room and offices will have wood panelling.

A \$62,600 general trades contract was awarded in July, 1963, to Bruinsma & Sons Limited, Chatham contractors, to construct a Museum at Rondeau Provincial Park, located southeast of Blenheim, on Lake Erie, in Kent County. The project had advanced to 92 per cent with occupation expected in the summer of 1964.

The Museum is about 85 feet by 52 feet, single storey, of frame and masonry construction with a stone and wood finish exterior. A heating plant has been included in the project so that the building can be used on a year-round basis. The main part consists of a museum display floor and also contains a laboratory and workroom, an office for the naturalist and wash-



Perspective of the Nature Museum at Rondeau Provincial Park

room facilities for the public. The main function of the museum will be to exhibit panoramic displays of anthropology and archaeology pertaining to Rondeau Park and its surroundings. A second function will be as head-quarters for the park naturalist who will carry out research and prepare specimens for exhibition. A turtle pool and aquarium has been provided for fish exhibits. Exhibits of wildlife will also be featured. Rondeau Park is famous for its birds, deer and other wild life.

A Nursery Office and Shipping Barn is being erected at Swastika Tree Nursery by Welcon Limited, of Guelph, who received a \$91,677 general contract in November, 1963, for its construction. At the end of March, 1964, the project stood at 35 per cent. The Swastika Tree Nursery was established about six years ago by the Department of Lands and Forests and tree production has reached the stage where better facilities for shipping were required. The Nursery is located about 15 miles east of Kenogami, off Highway 66. The T-shaped building has one floor, is about 120 by 95 feet, and is divided into storage and administrative areas. Construction is a combination of concrete block in the storage area and timber frame in the administrative section with concrete floors and flat roof. The 77 by 50-foot storage area will have a canopied 80-foot loading dock and boiler room facilities.

The new Chief Ranger's Office and Warehouse at Timagami is being built by Ouellette and Rochefort Limited, of North Bay, at a contract cost of \$52,440. The 51 by 37-foot building will have a basement and ground floor and is being located south of Fifth Avenue, next to the existing O.P.P. detachment building fronting on Lake Timagami. Construction will be of wood frame on concrete foundations with flat roof. Interior panelling will be of wood. The basement area will contain general storage and the boiler room. On the ground floor, will be the administration section consisting of the general office, public space and washrooms, and offices for the chief ranger, inspectors for Lands and Parks, scalers, as well as a radio room. The existing wooden dock in front of the detachment building is to be extended to also front the new project. Overall construction at the end of March 1964, had reached 32 per cent. Two houses for Lands and Forests personnel are also being built.

# For The Department of Reform Institutions

A large renovation program involving repairs to buildings and dormitories is in progress at Rideau Industrial Farm, Burritt's Rapids. The work is being done by Department of Public Works forces and is about 80 per cent done. A new stores building was also provided.

### For The

# Department of Tourism and Information

Two new tourist reception centres were provided for the Department of Tourism and Information at Cornwall and Prescott (Johnstown).

Contract awards for these two buildings were both announced the latter part of June, 1963 — the Prescott job going to D. C. Snelling Limited, of Prescott, for \$65,811, and the Cornwall project to John Entwhistle Construction Limited, Cornwall, at a cost of \$69,611. Five firms bid for both jobs. Both were essentially finished at the end of the fiscal year.

The new centre at Prescott was built at the junction of Highway 16 and the Prescott-Ogdensburg Bridge at Johnstown, some two to three miles east of Prescott, south of the 401. It replaces the old frame building at the ferry dock. The new location will be more accessible to tourists flocking over from the U.S.A. during the summer seasons.

The Cornwall centre was erected close to the Cornwall-Massena International Bridge and replaces the bureau near the old bridge.

The Prescott and Cornwall tourist reception centres are identical. They are single-storey with cut stone facings and walls of brick, about 52 by 38 feet in size and containing 2,000 square feet of floor space. Roofs are asphalt shingles with metal flashings. Each has facilities for dispensing tourist information, a lounge, restrooms, and staff quarters at the rear

A \$24,958 contract was awarded Srigley Construction Limited, of Gananoque, for an addition and renovation to the travel bureau at Ivy Lea. This job was about 70 per cent done with completion expected in April, 1964.

Work continued on the new tourist reception centre in Windsor's new civic square. Final inspections were made on the project in May, and Tourism and Information personnel occupied the building on May 27, 1963.



New tourist reception centre, Cornwall

At Rainy River, a building was acquired by Public Works and renovated for use as a reception centre.

### HISTORICAL PLAQUES

At Ingersoll, an historical plaque was installed in the Town Hall. A plaque entitled "Lake Nipissing" was erected at Callander Lookout.

# For The Department of Transport

The Driver Examination and Issuing Centre at Port Credit (Dundas Highway and Dixie Road) underwent major renovations to the building including exterior services, landscaping and paving of the parking areas. A \$51,018 general trades contract was awarded to R. B. Bayly Associates of Port Credit for renovation of the building. The contract for paving and landscaping went to Raponi-Eastwood Paving & Construction Limited, Port Credit, at \$42,957.86.

# For The Ontario Government Exhibits

The Canadian National Exhibition was held in Toronto from August 16 to September 2, 1963, inclusive. As in former years, the Department of Public Works prepared the Province of Ontario Building in Exhibition Park for a combined exhibition by the many departments of the Ontario Government.

New general lighting was installed in the northeast and northwest sections of the building last year. This was extended to the southeast and southwest areas this year. In addition, new lighting was provided at the main entrance on the north side and a large neon sign erected on the lakefront side. Floors and walls of the interior were painted.

Exhibiting were the Departments of Agriculture, Attorney General, Economics and Development, Education, Energy Resources, Health, Highways, Labour, Lands and Forests, Mines, Municipal Affairs, Reform Institutions, Transport, Travel and Publicity, Water Resources, Ontario Hospital Services Commission, Provincial Secretary and Citizenship and the Provincial Archivist.

The Central Canada Exhibition was held in Ottawa from August 23 to August 31, inclusive, 1963. The Department of Public Works organized the Ontario Government Exhibit which forms a part of this annual exhibition. Installation and maintenance of all mechanical services, interior redecoration, exhibit settings and sign work for the various government departments exhibiting was also supplied by the Department of Public Works.

Displays were prepared by the Departments of Health, Highways, Labour, Lands and Forests, Reform Institutions and Transport. The Department of Agriculture exhibited in another building at the exposition.

#### BOILER INSPECTION

The boiler inspection work of this Department, as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs as to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario Hospitals and Reformatories, the reports as referred to were sent to the Departments of Health and Reform Institutions, respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir,

Your obedient servant,

A sauche.

D. G. Creba,

Chief of the Architects' Branch

Toronto, March 31, 1964.

# Report of the Manager, Real Estate Branch

Parliament Buildings, Toronto, Ontario, March 31st, 1964.

MR. J. D. MILLAR,
Deputy Minister,
Department of Public Works.

The following is a general summary of the work completed by the Divisions of this Branch during the fiscal year 1963-64:

#### PROPERTY DIVISION

101 purchases 188 leases 44 sales		\$2,752,986.00 5,530,797.91 64,214.80
333 items	_	\$8,347,998.71

#### **Appraisals**

Conservation Authorities Water Lots Other Valuations	 96 parcels 6 parcels 4 parcels	 \$1,902,659.50 89,660.00 21,950.00
		\$2,014,269,50

### **Property Management Section**

Payment of Rent — Cana	dian Funds —	\$1,902,307.70
— U.S.	Funds	22,930.39
— Italia		2,066,000 lire
— Germ	nan Marks —	13,500 marks
D C		

Revenue from Property	 \$1,195,718.47
Taxes Paid	
_	 64,935.41
Insurance Paid	 23.591.56

## LAND SURVEYS DIVISION

During the fiscal year April 1, 1963 to March 31, 1964, the Land Surveys Division were assigned 79 field projects, 58 of which were completed. These ranged in size from small easements to Master Plans of Government Institutional holdings.

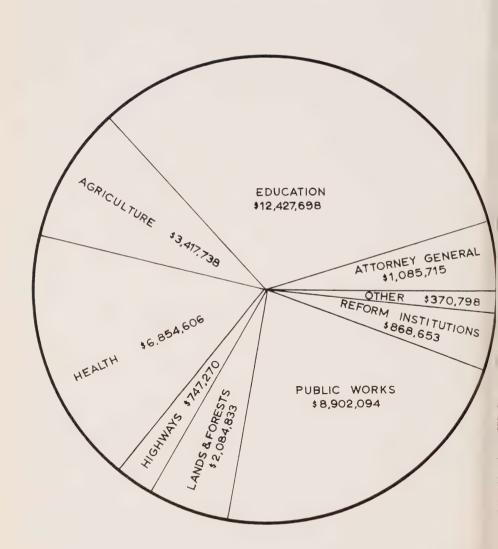
### OFFICE ACCOMMODATION DIVISION

The office Accommodation Division was transferred to the Real Estate Branch effective December 23, 1963, and is presently occupied in carrying out Space Analysis for recommendations in regard to the occupation of the new Queen's Park Complex, together with other smaller jobs involving the transferring of parts of Departments, both in Government-owned and in leased premises.

Respectfully submitted,

E. J. Parker, Manager, Real Estate Branch.

# ONTARIO DEPARTMENT OF PUBLIC WORKS CAPITAL EXPENDITURES 1963-64



NEW CONSTRUCTION and CAPITAL IMPROVEMENT \$36,759,405 (GROSS)

# Report of the Chief of the Accounts Branch

Department of Public Works, Ontario, Toronto, March 31, 1964.

MR. J. D. MILLAR,
Deputy Minister of Public Works,
Parliament Buildings,
Toronto, Ontario.

SIR:

I have the honour to submit detailed statements of Ordinary Expenditure of Civil Government and maintenance and repairs of Government Buildings and Public Works; also Capital Expenditures on Provincial Government Buildings and Public Works, during the fiscal year which ended on the 31st of March, 1964.

I have the honour to be, Sir,

Your obedient servant.

Chief of the Accounts Branch.

A /a Easson

# Report of the Department of Public Works

Fiscal Year Ending March 31st, 1964
REPORT OF THE ACCOUNTANT

The following figures show an increase in the operations of the Department over the previous year:

Ordinary

Capital

\$12,132,777.62 \$29,421,502.27 \$41,554,279.89

Total

21,680,52

64,312.15

27,542,50

7,471.43

1962-63	1	1,848,366.85	26,377,041.33	38,225,408.18	
Dancout Ingress	\$	284,410.77 2.40%	\$ 3,044,460.94 11.54%	\$ 3,328,871.71 8.71%	
Percent Increase		, ,	, ,	0.71/0	
		OF EXPEN			
For Fiscal Year Ap	oril	1 st, 1963 t	o March 31st,		
Service		Ordinary	Capital	Total	
Main Office — Administration					
expenses, etc.	\$	1,126,561.68		\$ 1,126,561.68	
Maintenance and Repairs — Government Buildings	1	0,717,615.70		10,717,615.70	
Public Works — Dams, Docks, Locks, etc.		91,372.19	\$ 903,998.61	995,370.80	
Public Works — Aid to Drainage		109,733.28	28,517,503.66	109,733.28 28,517,503.66	
Public Buildings Miscellaneous		87,494.77	28,317,303.00	87,494.77	
	\$1	2,132,777.62	\$29,421,502.27	\$41,554,279.89	
STATEMENT OF REVENUE					
Commission of Telegraphs					
and Telephones	\$	6,909.86		\$ 6,909.86	
Sale of Material		14,748.95			
Rentals		1,213,879.43		1,213,879.43	
Perquisites		2,818.00		2,818.00 2,018.65	
Building Equipment		2,018.65		21,680,52	

A. A. EASSON, Chief of the Accounts Branch.

64,312.15

27.542.50

92,764.65 \$ 1,362,291.49

TORONTO, March 31st, 1964.

Plan and Contract

Security Deposits

Federal Grants

Miscellaneous Sale of Property

Fiscal Year

1963-64

21,680.52

\$ 1,269,526.84 \$

7,471,43

# Statement of Expenditures, Main Office Maintenance, Repairs and Construction of Public Buildings

# For Fiscal Year Ending March 31st, 1964

### ORDINARY

Service	Amount	Amount
MAIN OFFICE Minister's Salary. Salaries. Travelling Expenses. Maintenance Insurance Unforeseen and Unprovided. Compensation — Medical, etc., for Injured Workmen Unemployment Insurance.	814,237.07 9,147.23 85,745.47 56,743.29 97.75	\$1,126,561.68
ONTARIO GOVERNMENT BUILDINGS		
Salaries — Maintenance Staff.  Maintenance — Fuel, Electricity, etc.  Communication Services  Furniture, Furnishings and Equipment  Repairs, Alterations and Incidentals	\$3,534,648.35 892,761.65 983,504.49 51,392.94 3,164,823.34	
Deduct Rentals	\$8,627,130.77 3,000.00	
		\$8,624,130.77
LEASED PREMISES		
Rentals and Expenses		\$2,093,484.93
MAINTENANCE OF LOCKS, BRIDGES, DAMS AND DOCKS, ETC.		
Maintenance		\$ 91,372.19

### ORDINARY (Continued)

Service	Amount	Amount
AID TO DRAINAGE		
To provide for grants in aid of drainage work in accordance with the Provincial Aid to Drainage Act, 1954	\$ 103,559.73	
Salaries and expenses in connection with pre- paring drainage schemes, and for the con- struction, improvement or reconstruction of trunk channels for farm drainage in Northern Ontario, including expenses in connection with drainage works which may qualify for grants under the Provincial Aid to Drainage Act, 1954	4,376.06	
Municipal Drainage, including grants in aid thereof	1,797.49	
		\$ 109,733.28
MISCELLANEOUS		
Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith	\$ 67,876.43	
To provide for grants towards the cost of construction of new Jail accommodation as may be directed by the Lieutenant Governor in Council	13,823.81	
Aid — Remedial Works, etc. — Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor in Council	5,794.53	
		\$ 87,494.77

TOTAL ORDINARY EXPENDITURE..

\$12,132,777.62

#### CAPITAL

Service		Amount	Amount
PUBLIC BUILDINGS			
To provide for the construction ings and works, purchase buildings, alterations, equipment tension of services to existing works and the purchase of plant and equipment and stores and expenses in confusion.	of lands and oment and ex- g buildings and f construction materials for nection there-		\$28,517,503.66
DAMS, DOCKS AND LOCKS			
Construction of Dams, Docks	and Locks		903,998.61
TOTAL CAPITAL DISBURS	SEMENTS		\$29,421,502.27
	SUMMARY		
ORDINARY EXPENDITURE			
Main Office, Maintenance and Government Buildings	d Repairs of		\$12,132,777.62
CAPITAL DISBURSEMENTS			
Public Buildings and Public Wo	orks		29,421,502.27
			\$41,554,279.89

A. A. EASSON, Chief of the Accounts Branch.

TORONTO, March 31st, 1964.

# Report of the Chief of the Civil Engineering Division

Parliament Buildings, Toronto, Ontario, March 31st, 1964.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

The work performed under the supervision of the Chief, Civil Engineering Division during the fiscal year 1963-64 was as follows:

#### 1. HYDRAULIC SECTION

#### (A) DAMS, DOCKS, LOCKS, ETC.

SUMMARY:

The investigation, pre-engineering, design, construction and inspection of the work on dams, docks, locks, etc. was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas.

Four concrete dams, one rock filled dam and one lock, previously commenced, were completed. Three concrete dams and one timber dam were started and completed this year. Work on two concrete dams, one timber dam and one trout rearing station was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

#### AYLEN LAKE DAM, Dickens Township, Renfrew District

The dam at the outlet of Aylen Lake was originally installed by lumbering interests about 1882, to facilitate log driving on the Opeongo River. Since 1957, when the lumbering operations ceased, the dam was operated by the Department of Lands and Forests for maintaining the lake level as required for the extensive summer cottage developments on the lake. In 1960 the dam was found to be deteriorated beyond repair and in 1961 the Department of Lands and Forests requested reconstruction of the dam.

The new reinforced concrete dam consists of one 14-foot sluiceway and upstream and downstream wingwalls which tie into earth filled embankments. The dam is based on solid rock. The head of water measured from the sluiceway sill to the controlled water level is 10 feet and the deck of the dam is four feet two inches above this level. The total length of the concrete portion of the dam is 82 feet and the total height from the bottom of foundation to the top of the deck is 19 feet. The deck of the dam was designed to serve as a road bridge for vehicle traffic and as an operating platform for controlling the water level.

# BIG TROUT LAKE DAM, Bishop Township, Nipissing District

Reconstruction of the dam at the outlet of Big Trout Lake, in Algonquin Park, was requested by the Department of Lands and Forests and the work was commenced in February 1964.

Access road was built to the site, construction camp erected and the site prepared for construction work which will be carried out next fiscal year.

# BROADWELL LAKE DAM, Hardy Township, Parry Sound District

The dam at the outlet of Broadwell (Rainy) Lake was originally installed by lumbering interests and later abandoned. In 1962, the Department of Lands and Forests requested reconstruction of the dam. The new dam, by controlling the water level on the lake, will benefit fish and wildlife propagation and assist in forest fire protection.

An access road to the site was built, camp buildings were erected, concrete aggregate was brought in and excavation was carried out during this winter. Construction of the new dam will be carried out next fiscal year.

# CEDAR LAKE DAM, Deacon Township, Nipissing District

Reconstruction of a rock-filled crest overflow dam across the Petawawa River at the outlet of Cedar Lake was commenced last fiscal year and was continued through the winter of 1962-63. The project was completed August 17, 1963.

The new dam is 600 feet long and up to nine feet high. The downstream part of it was made of rock fill, the upstream part of well compacted gravel and clay loam. A 10-inch thick timber core wall was installed along the centre line of the dam. It separates the impervious gravel fill from the rock and forms the crest of the dam. In the deepest portion of the river channel, where a washout took place during the 1963 freshet, the core wall was replaced by a nine feet high rock filled timber crib which is 128 feet long, 20 feet wide at the bottom and 10 feet wide at the crest.

# CRANE LAKE DAM, Conger Township, Parry Sound District

Building of the access road to the site, erection of the camp buildings and bringing in of concrete aggregate was completed last fiscal year. This year,

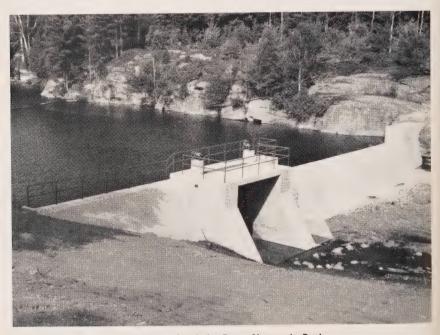
reconstruction of the dam was carried out and the project was completed on November 29, 1963.

The dam was reconstructed with reinforced concrete. It rests on solid rock and is 140 feet long. The dam consists of an approach wingwall, one 14-foot sluiceway fitted with timber stoplogs and an overflow wingwall section with a 68-feet long crest. The head of water measured from the sluiceway sill to the controlled water level is seven feet and the top of the deck is four feet above this level. A pair of stationary gear winches operate the stoplogs.

### FLETCHER LAKE DAM, McClintock Township, Haliburton County

The dam at the outlet of Fletcher Lake was originally installed around 1919 by lumbering interests. It was repaired by the Department of Lands and Forests in 1938 and 1957, and was listed for reconstruction in 1962.

The new reinforced concrete dam controls a drainage area of nine square miles and maintains water levels in Fletcher, Bear and Duck Lakes. It is comprised of an "OGEE" type spillway with a 110 feet long overflow crest and a 36-inch square slide gate for drawdown of the lake during winter, if necessary. The total length of the dam is 160 feet and the height from the foundation to the top of the operating platform is 12 feet nine inches. The dam was completed on November 1st, 1963.



New dam, Joe Lake Dam, Algonquin Park

#### JOE LAKE DAM, Peck Township, Nipissing District

The dam at the outlet of Joe Lake was originally installed by lumbering interests. In 1923 it was reconstructed with timber by the Department of Public Works to provide water for power generation downstream. In 1938 it was reconstructed with concrete but in 1963 the structure was deteriorated to such an extent that reconstruction appeared necessary.

The new dam will control a drainage area of 46.7 square miles and maintain water level on the lake for tourists and wildlife interests and serve as a storage dam for power requirements downstream in the Muskoka lakes system.

The reinforced concrete dam is 155 feet long. It is based on rock and is comprised of a 40-foot approach wingwall, a 14-foot sluiceway fitted with timber stoplogs, a 36-inch square slide gate and an 80-foot "OGEE" type overflow spillway with the crest at regulated water level. The head of water from the sluiceway sill to the regulated water level is 10 feet and the top of the deck is four feet above this level. The total height of the dam from the foundation to the top of the deck is 17 feet. Fixed gear winches operate the stoplogs. The dam was completed on August 3, 1963.

#### MAGNETAWAN LOCKS, Chapman Township, Parry Sound District

The timber dock immediately downstream of the locks was extended by 80 feet to provide additional docking facilities for boats. The lock gates were reconstructed with timber; the four gate panels each 24 feet high and 18 feet seven inches wide were completed and will be installed early next season.

#### PROVINCIAL FISH HATCHERY, NORMANDALE, Charlotteville Township, Norfolk County

Work on construction of the outdoor rearing station portion of the hatchery was commenced in November, 1963. An access road to the site was built and excavation for foundation of the wet well and two concrete dams was carried out during this winter. The construction work will be proceeded with during the next fiscal year.

#### PICKLE LAKE DAM, Ponsford Township, Kenora District

Reconstruction of the dam at the outlet of Pickle Lake was requested by the Department of Lands and Forests to stabilize the water level in the lake for the Lands and Forests air base.

The new dam of rock filled timber crib construction is 160 feet long and comprises one 14-foot sluiceway and a 50 feet long crest overflow wingwall. The head of water from the sluiceway sill to the regulated water level is five feet and the deck is four feet above this level. Total height of the dam is 13 feet. A pair of stationary gear winches operate the stop logs. The dam was completed on August 6, 1963.

#### PORT CARLING DAM AND SMALL LOCK, Medora Township, Muskoka District

Reconstruction of the dam across the Indian River at Port Carling was carried out during the winter of 1962-63. This fiscal year, reconstruction of the lock was proceeded with and the lock and dam were put into operation on August 22, 1963.

The reinforced concrete dam was based on a layer of compacted sandy gravel. A concrete cut-off wall two feet thick and up to eight feet high was extended below the foundation of the dam to solid rock. The dam is 150 feet long. It comprises six 14-foot sluiceways and a stilling basin. The sluiceways are fitted with timber stoplogs. The head of water measured from the sluiceway sill to the controlled water level is seven feet six inches and the top of the deck is four feet above this level. The total height of the dam from the bottom of the foundation to the top of the deck is 16 feet. A pair of movable gear winches operate the stop logs.

The new lock is 80 feet long and 12 feet wide with a minimum draught of three feet, six inches above the sills.

The lock is operated by a hydraulic control system.

#### RAGGED LAKE DAM, Peck Township, Nipissing District

The existing concrete dam at the outlet of Ragged Lake was constructed by this Department in 1940. This fiscal year, a 30 inches by 30 inches square steel slide gate was installed in the north westerly sluiceway and repairs were made to the crest overflow wingwall.

#### RITCHIE FALLS DAM, Township "J", Algoma District

Improvement of the access road to the site, erection of the camp buildings, and some work on excavation for the by-pass channel and foundation of the dam was carried out last fiscal year. This year, reconstruction of the dam was carried out and it was put in operation on December 23, 1963.

The dam was reconstructed with reinforced concrete and earth fill and was based on solid rock.

The dam, including the earth filled wingwalls is 390 feet long. The reinforced concrete spillway section comprises four 12-foot sluiceways which are fitted with timber stoplogs. The head of water measured from the sluiceway sill to the controlled water level is 10 feet and the top of the deck is six feet above this level. The total height of the dam from the bottom of the foundation to the top of the deck is 18 feet. The deck is designed as a bridge deck for passage of secondary road traffic and provides for a 15 feet wide roadway across the dam. A pair of movable gear winches were installed for operation of the stoplogs.



New small lock and dam, Port Carling, Muskoka

## DAM AT EARL ROWE PROVINCIAL PARK, Tosorontio Township, Simcoe County

The Department of Lands and Forests requested construction of a dam across the Boyne River in the area of a newly established extension of Earl Rowe Provincial Park. The 85-acre reservoir which will be created will be of the same size as the mill pond which existed at the site approximately 60 years ago. A fishway will be incorporated in the dam to pass the annual migration of trout on the Boyne River.

The work on preparation of the site was carried out during the winter months of 1963-64 and the construction work will be proceeded with during the next fiscal year.

#### SNOWSHOE RAPIDS DAM, Kenora District

Building of the access road to the site, erection of the camp buildings and some work on excavation for the by-pass channel and foundation of the dam was carried out last fiscal year. This year, reconstruction was carried out and the dam was put in operation on November 22, 1963.

The dam was reconstructed with reinforced concrete, steel sheet piling and rock fill.

The dam is 456 feet long. It consists of an earth filled approach wall, a reinforced concrete spillway section with four 14-foot sluiceways and a stilling basin and a 280 feet long crest overflow wall. The foundation of the spillway

section is surrounded by steel sheet pile cut-off walls. The sluiceways are fitted with steel chases and timber stoplogs. The head of water measured from the sluiceway sill to the controlled water level is seven feet and the top of the deck is seven feet, three inches above this level. The total height of the dam from the bottom of the foundation on the spillway section to the top of the deck is 23 feet. A pair of movable gear winches were installed.

The crest overflow wall was constructed with steel sheet piling. A welded steel cap was placed on the top of the pile wall to form the overflow crest and a carpet of heavy rock fill was placed along the downstream side of the wall for additional stability and for protection of the river bottom against erosion.

### TURTLE LAKE CHANNEL IMPROVEMENTS, Phelps Township, Nipissing District

The Department of Lands and Forests requested that the channel between Trout Lake and Turtle Lake be improved to provide for a proper inflow of water to the Turtle Lake Dam and for safety of navigation between the two lakes. The 450-foot long channel was widened and deepened by rock excavation to 50 feet of clear width and four feet of depth under minimum summer water level, as required for boat navigation.

#### CURRENT REPAIRS AND MINOR CONSTRUCTION WORK:

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the overhauling of stoplogs, winches and painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Blind River Dam, Algoma District; Burks Falls Dam, Parry Sound District; Deer (Cordova) Lake Dam and Fish Hatchery, Peterborough County; Huntsville Locks, Muskoka District; Kearney Dam, Parry Sound District; Knoephli Dam, Parry Sound District; Memesagamesing Lake Dam, Parry Sound District; Port Sandfield Dock, Muskoka District; Rydal Bank Dam, Algoma District; Skeleton Lake Dam, Parry Sound District.

#### GENERAL:

Minor repairs, adjusting of winches, painting of steel parts, replacing of stoplogs, etc., were made to 21 dams which are not listed above. Timber protection booms and safety cables were repaired, replaced or adjusted in front of 15 dams. Driftwood and beaver dams were removed from 30 dams.

#### (B) WATER CONTROLS AND NAVIGATION

#### WATER LEVELS:

The dams under Department of Public Works control were operated to maintain levels to satisfy the many interests concerned in the Muskoka-Parry Sound Districts.

#### AIDS TO NAVIGATION:

Two hundred and sixty-five floating buoys, 80 spar buoys and 17 rock signs were placed on the navigation routes in the areas of Lakes Muskoka, Rosseau and Joseph; 56 floating buoys and 3 spar buoys were placed in the Huntsville Lakes and Muskoka River; 53 floating buoys were placed in the Magnetawan River; various channels were kept clear of floating and submerged logs, overhanging branches, debris, etc., as required. Booms and protection cables were installed and maintained upstream of dams to protect the public during fast water periods at 16 locations; beaver dams, driftwood and debris were cleared out at 28 locations. Lawns, trees and landscaped areas at dam and lock sites were maintained and improved as required.

#### (C) LOCKAGES

The number of watercraft passed through the three locks operated by the Department was as follows:

(Owing to the reconstruction of the small locks at Port Carling, all boats were passed through the large locks).

Port Carling	 16.455	 36% increase over 1962
Huntsville	 1.62	 15% increase over 1962
Magnetawan	 260	 Slight decrease from 1962

#### 2. DRAINAGE SECTION

#### (A) PROVINCIAL AID TO DRAINAGE

Grants paid to organized municipalities during the fiscal year 1963-1964. (Period April 1 to May 31, 1963 only).

DUNDAS: Williamsburg Township, 1 grant, \$1,886.75; ELGIN: Aldborough Township, 15 grants, \$13,292.79; ELGIN: Yarmouth Township, 4 grants, \$9,303.49; ESSEX: Colchester North Township, 1 grant, \$11,403.20; ESSEX: Gosfield North Township, 5 grants, \$6,864.19; ESSEX: Maidstone Township, 1 grant, \$172.42; ESSEX: Mersea Township, 1 grant, \$330.12; ESSEX: Tilbury West, 5 grants, \$6,075.83; GRENVILLE: South Gower Township, 1 grant, \$546.52; HURON: Howick Township, 1 grant, \$318.16; KENT: Chatham Township, 5 grants, \$4,232.89; KENT: Harwich Township, 6 grants, \$2,352.19; KENT: Howard Township, 3 grants, \$1,684.64; KENT: Raleigh Township, 6 grants, \$8,623.46; KENT: Romney Township, 1 grant, \$708.50; KENT: Tilbury East Township, 3 grants, \$3,324.75; LAMBTON: Bosanquet Township, 3 grants, \$2,257.91; LAMBTON: Brooke Township, 8 grants, \$4,298.93; LAMBTON: Enniskillen Township, 1 grant, \$1,501.39; LAMBTON: Euphemia Township, 8 grants, \$5,414.83; LAMBTON: Moore Township, 16 grants, \$7,910.40; LAMBTON: Sarnia Township, 2 grants, \$2,657.80; LAMBTON: Warwick Township, 1 grant, \$466.60; LINCOLN:

Niagara Township, 1 grant, \$85.96; MIDDLESEX: West Williams Township, 1 grant, \$1,020.30; NORFOLK: Windham Township, 1 grant, \$344.67; PERTH: Downie Township, 3 grants, \$2,068.99; RUSSELL: Clarence Township, 1 grant, \$443.04; SIMCOE: Bradford (Town), 1 grant, \$3,500.00; SIMCOE: Tecumseh Township, 1 grant, \$469.01. TOTAL: 107 grants, \$103.559.73.

NOTE: The administration of the Provincial Aid to Drainage Act was transferred from the Department of Public Works to the Department of Municipal Affairs as of June 1, 1963, by Order-in-Council 1397/63.

#### (B) MUNICIPAL DRAINAGE

GRANTS PAID TO ORGANIZED MUNICIPALITIES:

Grants totalling \$1,797.49 were paid to municipalities in aid of municipal drainage in the following amounts: PARRY SOUND: Humphrey Township, \$487.49; RENFREW: Petawawa Township, \$375.00; Stafford Township, \$107.25; SUDBURY: Bigwood Township, \$827.75.

#### 3. ROADS AND LANDSCAPING SECTIONS

SUMMARY:

New construction, repair and improvement work on roads, parking areas, sidewalks, curbs, etc., involved an expenditure of \$320,000.00 and on land-scaping, athletic sports fields, field drainage, etc., \$105,000.00. The projects costing more than \$10,000.00 each are listed below.

#### DEPARTMENT OF AGRICULTURE

GUELPH — Federated Colleges: road and parking area, paving and replacing sidewalk, \$31,126.54.

#### DEPARTMENT OF ATTORNEY GENERAL

GRAVENHURST — Ontario Fire College: road and parking area paving, \$14.192.75.

#### DEPARTMENT OF EDUCATION

BELLEVILLE — Ontario School for the Deaf: field drainage — storm sewer, \$12,708.25.

#### DEPARTMENT OF HEALTH

CEDAR SPRINGS — Ontario Hospital School: road stablization, re-grading terraces, field drainage and sodding, \$17,167.30.

ORILLIA — Ontario Hospital: road and parking area paving, \$11,581.20.



Landscaping at Ontario Hospital School, Smiths Falls

PORT ARTHUR — Ontario Hospital: road and parking area paving, \$15,175.25.

SMITHS FALLS — Ontario Hospital School: clearing bush of trees and stumps, grading, field drainage, seeding and sodding, \$26,604.98.

WOODSTOCK — Ontario Hospital: road paving, \$12,500.10.

#### DEPARTMENT OF HIGHWAYS

DOWNSVIEW — Administration and Laboratory Buildings: road and parking area paving, \$14,432.38.

#### DEPARTMENT OF LANDS AND FORESTS

CHATSWORTH — Fish Hatchery: new roads, \$14,798.15. NYM LAKE — Park Headquarters: road paving, \$16,372.45. TEMAGAMI — Chief Ranger's Headquarters: road paving, \$13,715.40.

#### DEPARTMENT OF REFORM INSTITUTIONS

KENORA — District Jail: road and parking area paving, \$12,720.09. MILLBROOK — Ontario Reformatory: extensive grading, seeding, sodding and field drainage, \$21,320.45. SIMCOE — Ontario Boys' Training School: Athletic Sports field, including Cinder Track, \$19,359.60.



New road serving Chatsworth Fish Hatchery

#### DEPARTMENT OF TRANSPORT

PORT CREDIT — Driver Examination Centre: a test area and parking lot constructed, \$44,103.79.

#### GENERAL

Checking plans and redesigning roads, parking lots, sidewalks, curbs, gutters and areas to be landscaped for General Contracts at 34 locations as follows:

12 Ontario Provincial Police Detachment Buildings; 5 Ontario Hospital Buildings; 3 Trades School Buildings; 1 Department of Highways Ontario Garage; 3 Department of Travel & Publicity Reception Centres; 1 Ontario Government Registry Office Building; 9 Department of Lands and Forests Headquarter Buildings; Garages and Residences.

The major redesigning involved — Department of Health hospital sites and Department of Education trades schools, including the extension to the present hospital in London and new hospitals in South Porcupine and Palmerston and trades schools at Sault Ste. Marie, Ottawa and London.

This included checking of both plans and specifications and sometimes making new drawings and specifications.

#### 4. REMEDIAL WORKS

Grants totalling \$5,928.98 were paid to Municipalities for flood relief in the following amounts: Township of Harwich, County of Kent, \$500.00; Township of Rochester, County of Essex, \$5,428.98.

Respectfully submitted,

W. L. Rico

W. L. Rice, P.Eng. Chief of the Civil Engineering Division.

# Report of the Chief of the Sanitary Engineering Division

Parliament Buildings, Toronto, Ontario, March 31st, 1964.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

Prior to commencement of construction of the outside services for the Oueen's Park office expansion project, a survey was made in collaboration with the City of Toronto which encompassed all the streets in the vicinity of the present Parliament Buildings and the new site. Underground services on Surrey Place, above Grosvenor Street, and on Breadalbane Street between Surrey Place and Bay Street, will have to be abandoned. This means that the East Block will have to be re-serviced in such a way that it will not conflict with the new construction. The design, working drawings and specifications for this new service were completed. Tenders were called by the City of Toronto and a contract awarded for the watermain construction. This work. which was completed in October, 1963, consisted of the installation of a 12-inch cast iron main connected to the existing 24-inch main on Grosvenor Street at the corner of Queen's Park Crescent East. New service was extended on the east side of Queen's Park Crescent up to Wellesley Street, easterly on Wellesley Street to Yonge Street, where the service was connected to the existing 12-inch watermain. An 8-inch cast iron main was also constructed between the 12-inch main at Bay Street and the existing 6-inch watermain at Grosvenor Street. Connections for the new project and the East Block were provided. A new 10-inch watermain from the 12-inch main on Wellesley Street was also constructed on the east side of the East Block between the building and the Surrey Place west street line.

To provide adequate sanitary and storm drainage facilities, a contract was awarded in collaboration with the City of Toronto for the construction of a 21-inch diameter combined sewer. Manholes were located at the proper locations to receive new sewers from the proposed complex. While this sewer was under construction, the Department commenced the installation of the new combined sewer to serve the East Block. This work was completed in mid-December.

The sanitary sewage-pumping station at the Ontario School for the Deaf, Belleville, was eliminated because the City of Belleville annexed this area and extended its services.

At the Department of Highways Buildings, Downsview, because of the construction of three new traffic lanes on the north side of Highway No. 401, the existing water main was reconstructed north of its original location and closer to the buildings. This involved the installation of 1,950 lineal feet of 8-inch cast iron watermain, with enough 6-inch watermain to serve the relocated fire hydrants. For a more flexible water distribution system, a new 6-inch water service was provided from the east end of the 8-inch main to the administration building, and a second 6-inch water service was provided from the west end of the 8-inch main to the garages.

At the Psychiatric Research Institute for Children, Byron, the water distribution system was extended to provide domestic water supply and fire protection to the nurses' residence and the preventorium building. This is the last item in the reconstruction of all the underground services at this institute.

At the Ontario Hospital, New Toronto, the parcel of lake-front land adjacent to and west of the power house was sold to Metro for the construction of a new waterworks plant. While reclaiming the land on this site, Metro buried the power house storm sewer which formerly discharged into the lake. A visit was made to determine the logical route of a new storm sewer and it was discovered that the septic tank effluent drain was connected to the old storm sewer. Further investigation disclosed that the septic tank effluent from the doctors' residence, adjacent to the power house, was also discharging into Lake Ontario. A small sewage lift station was constructed on the east side of the power house to receive the sanitary wastes from both the residence and the power house. From here, wastes are pumped through a force main a distance of 675 feet to the hospital trunk sanitary sewer. A new 8-inch power house storm drain was also constructed. This discharges into a creek which flows into the lake east of the power house.

During the year three elevated water storage tanks, at various locations throughout the Province, were cleaned and repainted; minor emergency repairs were made on two others. The elevated wood stave water tank at Algonquin Park west gate, and the elevated water tank at the Horticultural Experimental Station, Vineland, were both dismantled because of changes in the respective water supply systems. Adequate services were provided for all new building projects as outlined in the chief architect's report.

A new water supply system was installed at the Ontario Government Building, Elk Lake. A 4-inch cast iron pipe intake was located at an adequate depth in the creek which flows into the Montreal River. The intake was carried to a 7-inch well casing about 50 feet from the edge of the creek and sunk 50 feet below ground. A submersible pump was installed capable of supplying 25 gallons per minute. The water is chlorinated and the pressure



Felling of wooden stave tank, Horticultural Experiment Station, Vineland



Sanitary sewage lagoon, Horticultural Experiment Station, Vineland

system is automatic. The submersible pump cuts in and out according to the water consumption.

Construction of the outside services was completed for the poultry and virology building at the Department of Agriculture Federated Colleges, Guelph. Installation of the services was extensive because provision was made for future additional buildings.

At the Horticultural Experimental Station, Vineland, the existing 8-inch cast iron irrigation watermain was extended 2,000 feet and carried across the Queen Elizabeth Highway to provide water for irrigation of the Victoria Farm. A new sanitary sewage disposal system was also completed. This included a sewage lift station with force main and a 1½-acre sewage lagoon.

At the Ontario Provincial Police Detachment, Bancroft, a gravity sanitary sewer was constructed from the building to the town sewer in the adjacent street, eliminating the septic tank and sewage disposal field which had been troublesome. Water supply at the Ontario Provincial Police Detachment, Sombra, was provided by extending the Village of Sombra watermain 500 feet to the detachment. Due to the nature of the soil, a small mechanical aeration package sewage treatment unit was provided.

Prior to the occupancy of the new buildings at the Ryerson Polytechnical Institute, Toronto, the sanitary sewers, storm sewers and watermains were completed. Construction was partly completed during the previous year.

Existing sanitary waste disposal facilities at the Ontario Hospital School, Aurora, were abandoned as being grossly inadequate, and research was carried out to determine the most economical and satisfactory means of disposal. As a result, a sewage lagoon was constructed 1,400 feet west of the hospital. The new construction consists of a system of gravity flow collector sewers terminating in the sewage pumping station. From here the sewage is pumped to the lagoon. A second lagoon was constructed to receive the overflow of the treated effluent from the first lagoon. A small pumping station was constructed to dispose of any remainder. At the new Ontario Hospital, Palmerston, sanitary and storm sewers have been completed with the exception of a few catch basins. Sanitary sewage disposal will be accomplished in a ten-acre lagoon which was 90 per cent completed during the year. Two large capacity wells for the water supply were also completed. The construction of the sewage lift station, the waterworks booster pumping station, the concrete water reservoir and the system of cast iron watermains will be completed by the end of this summer.

A sewage lagoon and sewage pumping station equipped with two pumping units was constructed to serve the store and comfort stations at the Portage Store, Algonquin Park. A complete new waterworks was provided for the district headquarters of the Department of Lands and Forests, Gogama.

This system was operating in December, 1963, and was designed to serve 115 people, with a capacity of 12,000 gallons per day. The Ontario Provincial Police Detachment at Gogama is also served by the new water system. Construction of a complete sanitary sewage system for the Department of Lands and Forests buildings and residences at Sioux Lookout started in July, 1963, and continued until winter set in. At this time the contract was 75 per cent completed and the system should be in operation by July, 1964.

At the Department of Reform Institutions Boys' Training School, Bowmanville, a new 60.000-gallon concrete underground water reservoir was constructed. In order to provide a water supply to the reservoir, the Town of Bowmanville water main was extended to the school property and a new pumping station was constructed. This system was operating early in January, 1964. A new complete water works system is 90 per cent completed, but not vet in operation, at the Ontario Reformatory, Guelph. The new two-compartment, 250,000-gallon underground concrete reservoir has been completed along with a concrete booster pumping station. In addition, the water distribution system has been completely reconstructed and will be in operation early in May, 1964. This system will adequately serve the institution, which has a high water consumption because of the canning plant, tannery, woolen mill, etc. Construction has been completed on the system of storm sewers in the power house area. At the Ontario Reformatory, Millbrook, the existing two-compartment underground concrete water reservoir was provided with overflow pipes and a valved drain pipe to each compartment. A valve chamber was provided to house the drain line valves, and a separate sewer installed to conduct the industrial wastes from the licence plate plant. A hypochlorinator was also installed in the pumphouse to chlorinate the water supply.

A second well with a suitable automatic pressure system was provided to serve the building extension under construction at the Department of Tourism and Information centre at Ivy Lea. A second septic tank was also provided.

During the year, at various locations throughout the Province, 29 deep wells were drilled, developed and brought into production. Twenty-seven of these wells were of medium capacity, i.e., with a production of from five to 20 Imperial gallons per minute. One of the other two wells, which is at the Federated Colleges, Guelph, has a capacity of 115 I.G.M.; the other well, at Burwash Industrial Farm Main Camp, has a capacity of 300 I.G.M. A suitable automatic pressure system was installed at each of the medium capacity wells. Suitable turbine-type deep well pumps will be purchased and installed soon at the two larger wells. Two existing wells were also repaired and test drilling was carried out at the Department of Lands and Forests, Angus, and at the Federated Colleges, Guelph. A complete site survey was



Development of well for Main Camp, Burwash Industrial Farm

carried out at the Ontario Hospital, New Toronto, the Ontario Reformatory, Mimico, and Brown's Clinic. From this a site plan was prepared, showing all buildings, roads, walks, fences, manholes, fire hydrants, etc., together with all underground services. In addition, a re-survey was made at the Industrial Farm, Fort William, and at the Department of Highways, Downsview.

During the past fiscal year all waterworks systems, sanitary and storm sewers, sewage treatment plants, pumping stations, etc., at the various hospitals, schools and other institutions throughout the Province, were maintained in good operating condition by this division.

Respectfully submitted,

HE Bushlew.

H. E. Bushlen, P.Eng. Chief of the Sanitary Engineering Division.

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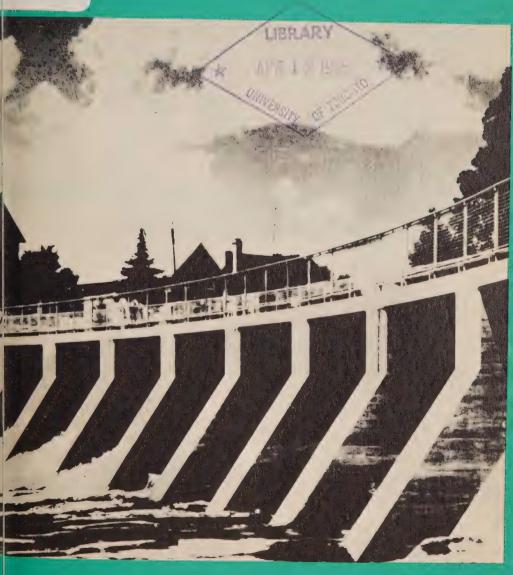
# EPARTMENT OF PUBLIC ORKS ANNUAL REPORT



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1965











# Report of the Minister of Public Works

**Province of Ontario** 

For the Year Ending March 31, 1965



Printed by order of the Legislative Assembly of Ontario

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THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE WILLIAM EARL ROWE, P.C.(C)

Lieutenant-Governor of the Province of Ontario.

#### YOUR HONOUR:

I submit for the information of your Honour, and the Legislative Assembly, the Annual Report of the works under control of the Public Works Department, comprising the report of the Deputy Minister, for the 12 months ending the 31st of March, 1965.

Lay Connell
MINISTER OF PUBLIC WORKS

Department of Public Works, Toronto, March 31, 1965. THE HONOLIRABLE RAY CONNELL. Minister of Public Works. Parliament Buildings. Toronto, Ontario,

#### SIR .

I have the honour to submit to you my General Summary together with the reports of the Chiefs of the Architects' Branch. the Real Estate Branch, the Accounts Branch, the Civil Engineering Division and the Sanitary Engineering Division, for the fiscal year, April 1, 1964, to March 31, 1965.

In presenting this Report, may I take the opportunity on behalf of the staff to express our appreciation to you for the kindly consideration you have given to all matters pertaining to Departmental administration.

May I also thank the members of the staff for their assistance and untiring efforts in carrying out another large construction program.

> I have the honour to be, Sir, Your obedient servant.

DEPUTY MINISTER OF PUBLIC WORKS.

Toronto, March 31, 1965.

#### Summary by the Deputy Minister

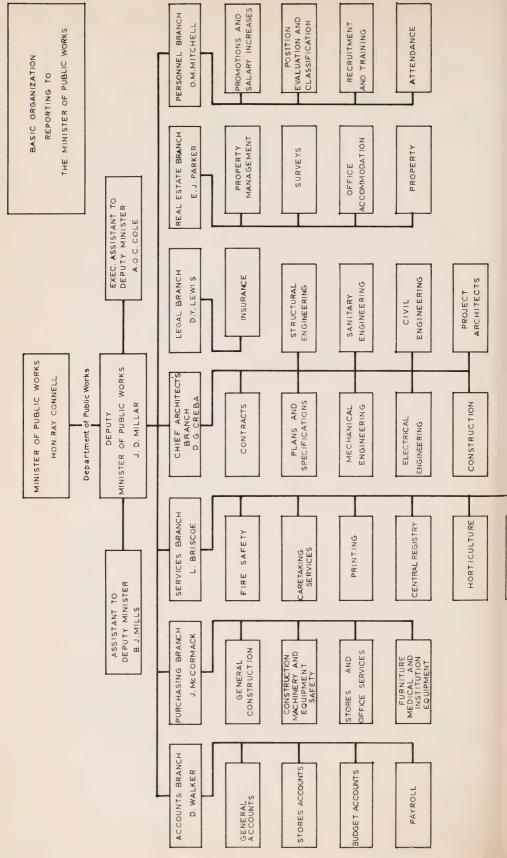
The highlight of the 1964-65 fiscal year's program of the Department of Public Works was of course the start of construction of the Queen's Park expansion project. This is the product of many years of planning in which so many persons have been involved that I could not hope to put together a comprehensive list. Some of the details of this project are outlined in the Chief Architect's report and much credit must go to him, his staff and our Associated Architects for the concept on which we are now proceeding. Our Property Branch is also to be commended for its work on a difficult land assembly.

Along with the addition to the Treasury building, which will be occupied next year, the Queen's Park project will provide sufficient space to meet the current needs of those major departments whose work necessitates them being in the Queen's Park area. The completion date of the first phase is subject to a great many factors such as strikes and supply of materials and skills, but it is hoped that it will be completed and occupied in 1967 and that we shall be able to proceed with the remainder of the project as quickly as possible. Another factor which may cause considerable concern is the rapidly increasing costs of construction which, if the present trend is continued, will throw our original estimates for the project away out of line.

Cost of construction will be one of our major concerns in the coming years and each request for additional space or new facilities for the various departments of government will have to be carefully weighed as to whether we should build or rent. This applies equally to Metropolitan Toronto and to most other areas of the province.

While the Queen's Park area steals the spotlight in this annual report, our spending in other areas should not be overlooked. Education took the largest slice of our \$36,759,000 capital spending, with more than one-third going for institutes of trade and technology, a College of Education and the second stage of the Milton School for the Deaf. Next to Education's \$12,425,000, outside of our own spending for legislative and general office buildings, was the \$6,850,000 spent for the Department of Health. The details of this spending will be found under the Health section of this report.

Another interesting phase of our operations was the complete renovation, for the first time since it was built almost 50 years ago, of the North Wing of the Main Parliament Building. This wing will now house the Department of the Provincial Secretary in the most modern and economic quarters we could provide. At the same time our program of renovations in the Main Building, for legislative purposes, was carried forward.



# Report of the Chief of the Architects' Branch

MR. J. D. MILLAR,

Deputy Minister of Public Works,

Parliament Buildings,

Toronto, Ontario.

#### DEAR SIR .

I have the honour to report on the work accomplished by the Architects' Branch of the Ontario Department of Public Works for the fiscal year April 1, 1964 to March 31, 1965.

This has been a notable year for Public Works. Multi-million dollar contracts were awarded for the Departments of Agriculture, Education and Health and lesser contracts for other divisions of government. This trend will continue through 1965 as plans come off the draughting boards to fill the requirements of government services.

The building program amounts to \$138,275,874 for projects completed during the year, in progress, or approved for construction by Treasury Board. An additional \$53,665,675 has been approved for planning to bring the gross capital commitments to \$191,941,549.

Of paramount importance was the launching of the Queen's Park expansion project last December with the award of a \$28,337,000 general trades contract to Perini (Western) Ltd., Toronto contractors, for first-stage construction. Details of this and other construction are contained in the following report.

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

Years of planning and detail work for the Queen's Park expansion project came into sharper focus on September 4, 1964, when Public Works Minister Ray Connell announced the calling of tenders for the first phase of the \$50 million program.

One of the most important office building projects in recent Canadian history, it will consist of four high-rise office towers linked by a spacious two-storey central core.

Tenders closed October 29, 1964, and there was great excitement in the

tenders office with representatives of eight major contracting firms, and other interested parties, on hand. Tendering was very close and resulted as follows:

Perini (Western) Ltd	Toronto	\$28,337,000
V. K. Mason Co. Ltd.	Toronto	28,368,500
Pigott Construction Co. Ltd	Toronto	28,490,500
Foundation Co. of Canada Ltd	Toronto	28,575,000
McNamara Construction Co. Ltd	Toronto	28,787,000
Redfern Construction Co. Ltd	Toronto	28,977,000
Inspiration Limited	Toronto	29,350,000
Anglin-Norcross Ontario Ltd	Toronto	30,361,000

The low bid was accepted and the award confirmed on Dec. 15, 1964.

On Thursday, January 7, 1965, Prime Minister John Robarts and Public Works Minister Ray Connell shared the handle of a pneumatic shovel to turn the first sod. Workmen had moved onto the site on December 22 and erection of hoardings and removal of trees began on December 28. Excavation started January 11. First concrete was poured March 23.

To date, more than 200,000 cubic yards of earth have been removed from the largest building excavation in Toronto. When excavation is completed, almost 280,000 cubic yards will have been moved. As many as 600 truck loads a day, each averaging eight cubic yards, have rolled from the mammoth hole in a steady procession to be dumped at an Eastern Ave. site.

Work on concrete footings is progressing rapidly for the Hepburn Block, at the south-west corner of the site. More than 49,000 cubic yards of concrete footings and foundations will be poured during Phase One. Steel is now being fabricated for a June delivery and more than 12,000 tons of structural steel will be erected.

Phase One will provide 563,000 square feet of usable space and will consist of the 11-storey Hepburn Block and the 14-storey Ferguson Block, at the north-west corner of the site. These will be linked by a rectangular core structure to be known as the Macdonald Block. This wide, two-storey building connecting the office towers has been designed to simplify pedestrian circulation from the streets and public transportation.

Approximately 8,000 government employees now working in scattered locations throughout Metropolitan Toronto will be moved into the 900,000

square feet of new space which will be created in the entire project. The development will cover almost two city blocks in the area extending easterly from the rear of the Whitney Block to Bay Street.

Its buildings will rise from a pleasant setting of landscaped grounds featuring fountains, reflecting pools and sculpture, that will add beauty to



Felling the first tree on Queen's Park project site



Excavation progress looking southwest



Another view looking northeast

the City's downtown park area by blending with the general land plan of Queen's Park.

Plans called for the closing of two streets — Surrey Place, which runs behind the Whitney Block, and Breadalbane Street, extending eastward from Surrey Place to Bay Street. A terraced, tree-lined park will be created between the Whitney Block and the new buildings, as well as south of the Whitney Block.

The main entrances to the buildings along Bay and Wellesley Streets will be set back from the street to permit additional small parks that will bring a new look to downtown building frontages.

The accent on open space will be continued in a spacious internal courtyard surrounded by the development's central core. Landscaped with trees, sculpture and reflecting pools, it is designed to relieve the mass of the highrising buildings.

The complex was designed to complement the existing government buildings. It has been laid out in such a way that its highest towers will not overwhelm or detract from the neighbouring structures. Its distinctive buildings will reflect a blend of classic dignity and free expression of contemporary design.

The Macdonald Block, which is the centre core, will be faced with Queenston limestone and Canadian granite. Entrance foyers will rise to the full two-storey height of the structure. A wide internal corridor-mall will encircle offices and public service areas located on the main floor. The second floor corridor-mall will extend through the main lobby area in the form of a bridge, imparting a dramatic effect of height.

The building will house those parts of government departments which deal most frequently with the public. Information centres will be located on the main floor to direct people to proper office locations to transact business. The second floor will consist of assembly and committee rooms for the common use of all government departments. Some of these committee rooms will be so arranged as to combine for a seating capacity of 300.

There will be a 1,500-seat cafeteria on the ground floor to cater to the needs of the 8,000 civil servants who will work in the five buildings. The four Queenston limestone-faced towers will be served by 36 high-speed elevators. Heating will be by natural gas with oil standby.

From each corner of the Macdonald Block will rise the four towers to contain the many government offices. Phase Two will include a 9-storey tower at the corner of Wellesley and Bay Streets, and the tallest tower —

24 storeys — at Bay and Grosvenor Streets. These will be known as the Hearst and Mowat Blocks, respectively.

All four towers will be of steel frame construction with walls of similar, but lighter coloured material to that used in the central core. The contrasting colour will heighten the focal point of the core as the centre of the complex.

Parts of the lower sections of the four towers will be "undercut", consisting only of supporting columns, to form a spacious two-storey colonnade that will reduce the weight appearance of the buildings.

The structures will have cleanly-expressed columns, continuous mullions and slender aluminum windows to emphasize their vertical delineation. The recessed windows will be sealed and double-glazed, with venetian blinds between the panes. Blinds can be controlled from within the air-conditioned offices

Construction economies will be made possible through the standardization of building materials, layout plans, and mechanical and service requirements. Low maintenance, durable materials — employing Ontario and Canadian products wherever practicable — will be used in the exterior and interior finishes.

The electrical services to the five buildings will be looped to four separate Toronto Hydro substations to reduce the possibility of a power cut-off to a minimum

The entire project is designed on a five-foot module to permit ready adaptation of desk layouts, lighting fixtures and office partitioning — highly important factors in providing flexibility in large departmentalized offices. A second floor pedestrian bridge will connect it with the Whitney Block.

An underground parking garage for about 400 cars will be located under the complex of buildings, and an additional two-level underground garage with about 400 spaces for public use will be built later beneath the park area between the Whitney Block and the Frost Building.

All deliveries to the new complex and the Whitney Block will be made by ramp entrances from Wellesley Street to basement levels. From a central distribution point supplies will be moved to service elevators in the various buildings.

The project and its preliminary design is the result of more than two years of study and planning by our own architects. It was first announced in 1962 by the Minister of Public Works, and land assembly and demolition of buildings were undertaken to make way for construction.

Four Toronto firms of architects were retained to do the final design and produce working drawings and specifications for the project. They are: Gordon S. Adamson & Associates; Allward & Gouinlock; Mathers & Haldenby; and Shore & Moffat and Partners.

C. D. Carruthers & Wallace, Consultants Ltd. were retained as consultants on structural engineering; H. H. Angus & Associates Ltd., consultants on mechanical engineering; and R. P. Alsop & Associates, consultants on electrical engineering.

Some idea of the size of the project may be taken from the fact there is almost one-half mile of hoardings in place. This is a requirement to protect the public against the excavation which will reach a maximum of 38 feet below grade.

To ensure dry foundations, 30,000 feet of weeping tile will be laid, and pumps with a capacity of 700 Imperial gallons per minute will work in coordination with three large sump pumps. All these precautions are necessary because test drilling revealed traces of the troublesome Taddle Creek. Some 100,000 cubic yards of gravel backfilling will be used.

The Queen's Park expansion project was actually preceded by work on construction of the Frost Building. Tenders were called early in February 1964, and the contract awarded on April 13 to Redfern Construction Co. Ltd., for \$4,162,000. Thirteen major contractors bid for the job. Mathers & Haldenby, Toronto architects, are associated on the project.

It is a crescent-shaped building, seven storeys high, 300 by 62 feet, and rises about 100 feet above a gray granite terrace. It is joined to the existing building by bridge-corridors on floors from two to six. It has been faced with Queenston limestone to conform with the existing Treasury Building and Whitney Block. A description of the building was given in the previous Report.

Work on the structure began in April with demolition of the old 7 Queen's Park Crescent building. Excavation work was completed in June, structural steel in November, with stone setting essentially finished before the turn of the year. By the end of the fiscal year the job had reached 61 per cent with an average of 108 men employed daily.

Interior work was in progress on the fourth, fifth and sixth floors; general roughing in of equipment in the penthouse; installation of equipment in the basement mechanical room under way; door frames were being installed on all floors and backfilling of the south tunnel in progress. Estimated completion date is in the Fall of 1965.



Frost Building extension — west elevation



Frost Building extension — east elevation

The largest renovation program of the old Parliament Building since it was first occupied in 1893 is currently in progress. Its ultimate purpose is to free most of the South Wing for strictly legislative purposes.

This has involved moving the Department of Education, the Department of Civil Service and the Queen's Printer to other quarters. It also provides for moving the Provincial Secretary's Department to the North Wing which is being completely renovated for the first time since construction some 50 years ago. Within a very short time personnel of the Provincial Secretary's Office should be moving into their new quarters.

Great changes have already been made in the South Wing. Renovations include a suite of offices for the Official Opposition; offices for Government Members and the New Democratic Party on the third floor; new offices for the Government Whip; a new Health Centre on the third floor; a suite of offices for the Minister of University Affairs on the third floor; alterations in the West Press Gallery for radio broadcasting, and a new TV and conference room on the first floor.

In the Whitney Block, extensive alterations were made to the boiler room to increase the steam generation to handle and service the new Queen's Park project.

## For The Department of Agriculture

At the University of Guelph site, two large projects worth \$4,509,572 in general trades contracts' awards were completed. These were the Chemistry and Microbiology building at \$3,154,700 and the Poultry, Pathology and Virus Research Institute at \$1,354,872.

The Poultry, Pathology and Virus Research Institute, contracted to Ball Bros. Ltd., Kitchener contractors, was 72 per cent complete at the close of the previous fiscal year and was essentially finished this year. Wings "B" and "C" had been taken over in February but a little minor work remained to be done on Wing "A".

This is a "T"-shaped, split level plan comprising 50,000 square feet of floor space, and was designed for research into the causes and control of infectious diseases in poultry and livestock. Previously, this work had been carried on in six separate laboratories. A description of the building was given in the previous year's Report.



Poultry, Pathology and Virus Research Institute, Federated Colleges, Guelph

The Chemistry and Microbiology building is substantially finished at 99 per cent and the building is expected to be taken over some time in May. Preliminary inspections of the first, second and third floors have been completed.

Dunker Construction Ltd. of Kitchener were the contractors for this job and William R. Souter and Associates the associate architects. It is the



Sterilizer room at Poultry, Pathology and Virus Research Institute



Electron microscope technician at work, Poultry, Pathology and Virus Research Institute

third major science building to be erected on the Guelph site in the last seven years. A Soils building was constructed in 1958 and a new Biology building in 1960.

Official opening of the Breeders' Service building at the O.V.C. took place on June 3, 1964, with the ceremonies being held in the auditorium of the Physical Education building followed by a tour of the new building. The



Chemistry and Microbiology Building, Federated Colleges, Guelph



One of laboratories at Chemistry and Microbiology Building

Hon. William A. Stewart, Minister of Agriculture, and the Hon. Ray Connell, Minister of Public Works, assisted by William J. Snowden, President of the Ontario Association of Artificial Breeders Association, officiated at the plaque unveiling ceremonies.

Briefly, it is a single-storey, 125 by 53-foot structure with full basement. General accommodation includes storage, freezing and production areas, cold rooms, research laboratory and offices, as well as a receiving and shipping platform.

It was built, furnished and equipped by the Department of Public Works for the Ontario Department of Agriculture with funds provided by the Ontario Association of Artificial Breeders at a cost of \$182,133. A. Battaglia Construction Company Ltd., Guelph, were the contractors and T. Allan Sage, also of Guelph, the associate architect.

There were two other small jobs. The Physical Education building was provided with a small addition which was completed before the end of the calendar year. A \$29,143.17 contract was awarded to Artifex Construction Ltd. of Guelph for its construction.

The other job was a dry sow barn at the Arkell Farm. William Parker Construction Ltd. of Guelph received a \$13,869 contract for the work which was completed in July.

Extensive renovation and maintenance work was carried forward at the colleges.

Tenders were called in January 1965 for the erection of an addition to the Home Economics building at the Kemptville Agricultural School. On February 2, 1965, a \$162,602 general trades contract was awarded to John Entwistle Construction Ltd. of Cornwall for the job.

Work on the project began on February 5. Stripping and stockpiling of the topsoil has been completed and excavation for the foundation is in progress.

The addition will provide dormitory accommodation for 40 home economics students by adding 20 rooms to the existing building.

The existing building was officially opened on June 3, 1961, but since that time there has been a substantial increase in the number of girls applying for admittance. Present accommodation is taxed beyond capacity.

The new extension will be of masonry construction with steel joists. It will approximate 94 feet six inches by 41 feet four inches in size and consist of a basement and two floors.

First and second floors will contain 20 bedrooms — 10 to each floor — with accommodation for two girls in each bedroom.

Contained in the basement will be a large lecture and assembly room, kitchenette, laundry room and areas for linen and trunk storage. It is anticipated the project will be completed for the fall school term.

At New Liskeard Demonstration Farm, a new 44 by 86 foot sheep barn was built during the year. The work was done by Farquhar Construction Ltd., North Bay, at a contract price of \$15,608.

# For The Department of the Attorney General ONTARIO PROVINCIAL POLICE BUILDINGS

The long range program to provide proper facilities for the Ontario Provincial Police was continued to the extent of \$1,886,255 for eight police detachment buildings and four district headquarters buildings.

Detachments at Goderich, Thessalon, Wawa and White River with a total contract value of \$505,810 were reported on and described the previous year and have been completed. Details of other construction are as follows:



New O.P.P. detachment building, Goderich



New O.P.P. detachment building, Thessalon



New O.P.P. detachment building, Wawa

DUTTON — A \$58,961 general trades contract was awarded Elgin Construction Company Ltd., St. Thomas, on July 6, 1964, to build a detachment building at Dutton. This was the lowest of four tenders submitted. The new detachment was built at the junction of two country roads, a half mile south



New O.P.P. detachment building, Dutton

of Highway 401. Facilities include a general office, three private offices, a two-cell detention area and male and female washroom facilities. Also included is a three-bay garage with storage rooms. Work began July 13 and the building was completed and occupied March 1, 1965.

Longlac — Tenders for a new detachment building at Longlac were called in April, 1964. The contract for the erection of this building went to Stephen Zysko Construction Company Ltd., Port Arthur, at a contract price of \$108,971. It was taken over and occupied in February, 1965.

The new structure has been located on Highway 11 in the Township of Longlac. The "T"-shaped, 103 by 76-foot building is a combination of timber frame and brick veneer and has a detachment area comprising a waiting room, general and private offices, storage area, washrooms and four-cell detention area. The courthouse section contains a courtroom and vestibule, magistrate's office and private washroom. The residence section has a living room, kitchen, three bedrooms, bathroom and utility room. A separate three-bay garage is included in the project.

MARATHON — A \$95,400 general trades contract to build a detachment building at Marathon was awarded to Bilodeau Construction of Fort William

in July 1964. The project was completed near the end of the fiscal year. Final inspection was made on February 3 and the building occupied by O.P.P. personnel during the same month. The new building is located on the north side of Highway 17, about one-and-one-half miles west of the access road to Marathon. The 89 by 76-foot "T"-shaped structure has three component parts: a detachment area with waiting room, general office, private office, male and female washrooms, a two-cell detention area and storage room; a courthouse with vestibule, court room, magistrate's office and washroom; a residence area consisting of living room, kitchen, three bedrooms, bathroom and utility room. A separate three-bay garage has also been included.

NAPANEE — Foley Construction Ltd., Kingston, were given a \$75,000 contract in August to erect a detachment building at Napanee. Except for minor details, the building is completed and ready for occupancy. The new structure has been erected on the west side of Highway 41, a quarter-of-amile south of Highway 401. This is one of the smaller O.P.P. detachments being 69 by 33 feet in size. It is timber-framed and has a general office, three private offices, interrogation room, washrooms, storage area and a three-bay garage.

Downsview — In December 1964 a \$305,900 general trades contract was awarded to David Farn Construction Ltd., Toronto contractors, to build a district headquarters building at Downsview. Work has just started.

The new headquarters will be built on the southwest corner of Highway 401 and Keele Street, adjacent to and east of the Department of Transport's drivers' examination building. Entrance will be from Falstaff Avenue. The eight-bay garage with storage area will be located on the east side of the building. Provision for ample parking has been made. The building will be about 134 feet by 35 feet and consist of a basement, first and second floors. Construction will be of steel frame and concrete block with external face brick, built-up flat roof, aluminum facia, flashings and window frames.

The entrance lobby will be on the first floor along with general office accommodation, private offices, and offices for the sergeant, corporals, radio officer, interrogation room, detention area and washrooms. The second floor will have an office for the district inspector, individual offices, dark room, filing and office equipment sections, identification room, lunchroom and male and female washrooms. The basement will contain a large conference room, various storage areas and filing sections, boiler and mechanical rooms, janitor's room, lockers, lunchroom, washroom and showers.

MOUNT FOREST — Early in November tenders were called for a district headquarters building at Mount Forest. Six firms bid for the project which

went to Paul Carruthers Construction Ltd. of Thornhill at \$224,000. Construction started that month and the project is now 13 per cent complete. Structural steel in the main building is completed and exterior concrete walls and waterproofing finished. The first concrete slab has been poured and 25 per cent of the concrete base done. About 30 per cent of plumbing in the basement is installed.

The new headquarters has been located on No. 6 Highway, about one mile from the centre of the town. It will be about 100 by 35 feet, consisting of a basement, first and second floors. Construction will be of steel frame and concrete block with external face brick, built-up flat roof, aluminum facia, flashings and window frames.

Contained on the first floor will be the entrance lobby, general office accommodation, private offices for the secretaries, sergeant, corporal, radio officer, telex communications, interrogation room, three-cell detention area and washrooms. The second floor will have an office for the district inspector, five individual offices, dark room, identification room, areas for files and office equipment, lunchroom, and male and female washrooms. In the basement will be a conference room as well as sections for storage, files, janitor's supplies, lockers, lunchroom, boiler room, men's washroom and showers. The three-bay garage will be at the rear. Parking for 28 cars will be provided in a paved area between buildings.

Peterborough — Late in October 1964, M. J. Finn Construction Ltd. of Peterborough was awarded a contract for \$243,893 to construct the new



Early construction of O.P.P. district headquarters, Peterborough

district headquarters building on the Peterborough by-pass, facing Highway 7. The building is identical to that at Mount Forest in size and accommodation. Work began in December. By the end of March 1965 the job was 27 per cent complete. For the main building, foundation walls were poured, steel erected, first and second floor slabs poured and blockwork laid above the first floor perimeter. Footings and walls were poured for the garage section.

SOUTH PORCUPINE — Tenders for a district headquarters building with separate garage to be erected at the corner of Highway 101 and Legion Drive, east of Timmins, were called in July. Five firms bid for the job. A \$268,319 general trades contract was awarded M. Sullivan & Son Ltd., Arnprior contractors, on October 20, 1964. The design, construction and general accommodation of the building is similar to that at Mount Forest and Peterborough with the exception that at one end of the first floor there is a segregated section with controlled individual entrance for the newly formed "Precious Metals Theft Branch". Construction has reached 11 per cent. The project is expected to be finished September 1965.

#### COURTHOUSES AND REGISTRY OFFICES

Alteration and renovation work was done at a number of Courthouse and Registry Office buildings during the year. The renovation scheme at the Sault Ste. Marie Courthouse, which was about 70 per cent complete last year, was finished by Department of Public Works forces. Cost of the renovation amounted to \$146,500. Major renovation at the Gore Bay Registry Office was finished in July. Construction of an addition to the North Bay Juvenile and Family Court building advanced from 35 per cent last year to completion last June. This job was contracted to Sted's Ltd. of North Bay for \$15,600. Just under way last year was a \$43,383 contract job for additions and alterations to the Fort Frances Courthouse. This job, carried out by Willer Lumber and Builders Supply Ltd. of Fort Frances, was accepted conditionally as finished in December. Renovation work was also done at the Parry Sound Courthouse.

Tenders for a new Registry Office building at Haileybury were called in March, 1965. It will be erected beside the existing courthouse and will be about 90 by 45-feet in size. It will be of steel construction with brick facing and comprise a basement and first floor. In the basement will be staff and public washrooms and areas for bookbinding and storage as well as record storage. The boilers will heat both the new building and the courthouse. The large general registry office and public area will be on the first floor; also offices for the registrar and deputy registrar, photo copy and drafting rooms and space for office storage.

### For The Department of Education

General trades contracts for the Department of Education amounted to \$20,715,677 for seven major construction projects. Of this amount \$10,156,677 represented the finishing touches to construction on the Eastern Ontario Institute of Technology, the Ontario Vocational Centre, both at Ottawa, and the Ontario Vocational Centre at London. Another \$2,646,000—the contract price for the Sault Ste. Marie Vocational Centre—was carried forward from the previous year while an additional \$7,913,000 was for new construction.

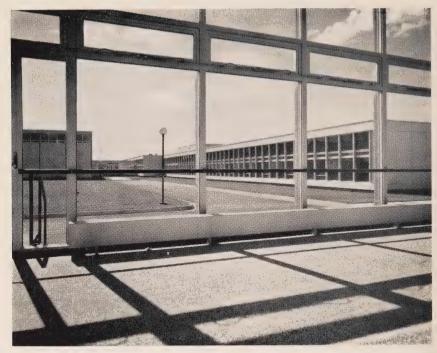
Planning proceeded for a new Hamilton Technical Centre which will provide a new building for the Institute of Technology and a new Ontario Vocational Centre on the same campus. Planning is also going ahead for a College of Education at Kingston, an Adult Education Centre at Toronto, a Bi-lingual Teachers' College at Sudbury and for the second stage of construction of the Kirkland Lake Northern Institute of Technology.

The Eastern Ontario Institute of Technology at Ottawa was officially opened on October 7, 1964, at a plaque unveiling ceremony at which the Minister of Education, the Hon. William G. Davis, the Minister of Public Works, the Hon. Ray Connell, and the Hon. Allan J. MacEachen, Minister of Labour, Canada, officiated.

The builders of this handsome new institute were the Pentagon Construction Co. of Montreal at a contract price of \$3,174,677. It lies on a 12-acre site at the end of Lees Avenue, near the Queensway, and extends back to the Rideau River. It was fully described in the previous Report.



New Eastern Ontario Institute of Technology, Ottawa



Classrooms and gymnasium area, Eastern Ontario Institute of Technology

This educational establishment is a single level building of brick, concrete and steel construction made up of three connecting wings. It is designed for easy expansion. Initial capacity is for 600 to 800 students. Construction began in April 1963 and it was completed in September 1964. Burgess, McLean and MacPhayden, Ottawa, were the associate architects.

The Ontario Vocational Centre, which was being built in another section of Ottawa at the same time as the Institute of Technology, was also completed before the turn of the calendar year. The entire complex, contracted to V. K. Mason Construction Co. of Ottawa for \$3,538,000, was turned over to Education in December. The buildings are located on Woodroffe Avenue, south of the Base Line Road.

Both of these sprawling educational plants were built and paid for under a Federal-Provincial Technical and Vocational Training agreement. Fully equipped, the total cost of these two institutions was about \$8,000,000.

The Ontario Vocational Centre at London was essentially finished in September 1964. Final inspections were made in October and the buildings turned over to the Department of Education. Foundation Co. of Canada



Classrooms and science section, Eastern Ontario Institute of Technology



Student surveyors, Eastern Ontario Institute of Technology

#### Some Interior Views at the EASTERN ONTARIO INSTITUTE OF TECHNOLOGY, OTTAWA





Classroom

Auditorium



**Aerodynamics laboratory** 



Biology laboratory

Ltd. of London were the builders and Blackwell, Hagarty & Buist, also of London, the associate architects. The contract price was \$3,444,000.

The complex of buildings was erected on a 1,000 by 657-foot tract of land on surplus Ontario Hospital property north of Oxford Street and east of

Highbury Avenue. There are two separate buildings of steel frame and concrete construction linked together by an underground tunnel.

Official Opening ceremonies were conducted on November 24, 1964, by the Hon. John P. Robarts, Prime Minister of Ontario, with the Hon. William



Main entrance of the New Vocational Centre, Ottawa



View of foyer, New Vocational Centre, Ottawa



Aerial view of the New Vocational Centre, London

G. Davis, Ontario Minister of Education, and the Hon. Ray Connell, Ontario Minister of Public Works, assisting. The Hon. Allan J. MacEachen, Minister of Labour for Canada, also took part in the ceremonies.

The Ontario Vocational Centre at Sault Ste. Marie is 80 per cent complete. Construction began on November 26, 1963, and at the end of the previous fiscal year had reached 12 per cent. The job is contracted to the Foundation Co. of Canada, Sudbury Unit, for \$2,646,000. It will have accommodation for 600 students.

The buildings are of reinforced concrete footings and foundation walls, concrete slabs, steel frame, masonry walls and built-up roofing. It consists of a basement and two-floor classroom wing, single-storey shops and heavy equipment wings. The total complex has a floor area of 160,000 square feet.

Exterior and interior masonry is finished in buildings "A" and "B" with exterior and interior walls, plastering and painting 90 per cent done in building "C". Interior work progresses. Outside services are 95 per cent complete with driveways and curbs 30 per cent.

Tenders were called on February 4, 1964, for a new senior boys' dormitory at the Brantford Ontario School for the Blind. Bidding for this project was very keen with eleven contracting firms from Toronto, Guelph, Hamilton, Welland, London and Brantford bidding for the job. The low bid of \$332,000, submitted by Shultz Construction Ltd., Brantford, was successful.

### Some Courses Taken At The ONTARIO VOCATIONAL CENTRE, LONDON



**Building Construction** 

Welding



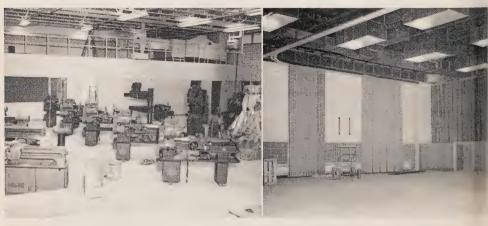
Statue and reflecting pool at New Vocational Centre, London

The building is 95 per cent complete. It comprises two storeys and basement and is built into the sloping brow of the hill overlooking the Grand River Valley.

The two dormitory floors will have bedroom accommodation for six house parents and 60 boys. Students' rooms, in general, will be two-bed rooms but a small number of single and four-bed rooms are provided on



Aerial view of construction, Ontario Vocational Centre, Sault Ste. Marie



Machine Shop

Gymnatorium



New Senior Boys' Dormitory, Ontario School for the Blind, Brantford

each floor. Both floors will have a central washroom, change room and shower room. House parents' rooms are distributed evenly amongst the students' rooms, on both floors. Each is provided with a small private bathroom.

Brooks and VanPoorten, Brantford architects, are associated on the project which is being built of non-combustible materials on a structural steel frame with concrete floors and steel joists. Exterior walls are brick, windows aluminum, and all door frames steel.

On each floor there are small sound-insulated rooms for musical practice and a good sized lounge or common room with adjacent kitchenette. Study desks and wardrobes are being built-in to prevent changing of furniture arrangements. The study desks will be larger than normal to provide space for large Braille volumes and tape recorders used by blind students in their work.

Resilient tile of medium hardness will cover all floors for better hearing by students. There will be no carpeted floors in the building.

Steam is brought underground from the main boiler house, which is used to heat water for the heating system, and for domestic hot water and showers. The building is well insulated, and much attention has been given to good heating, natural light and ventilation.

A \$3,038,000 general trades contract was awarded Ellis-Don Ltd., London, on April 8, 1964, to build the new Ontario College of Education at London. This was the lowest of five tenders.

The college will offer professional training for prospective secondary school teachers of academic, commercial and technical subjects. Normal capacity will be 600, but plans include ready adaptation for 800.

Work on the college began in the month of the award and is now at the half-way mark. It should be completed late in 1965. It is being erected at the intersection of Huron Street (Sarnia Gravel) and the Wharncliffe Road (Western Road). Vehicular and main pedestrian entrances will be from the Wharncliffe side.

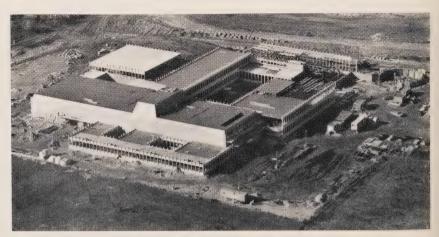
The administration section will front the college with parking for 263 cars. The design by London architect H. L. Hicks includes an open court surrounded by the academic, seminar and cafeteria wings and, branching off from these, the shops wing. Consulting engineers are: structural, Peter T. Miches and Associates; mechanical and electrical, R. A. Egan and Associates, both of London.

A two-storey circular library will dominate the northeast corner like a turret on a castle. An open mezzanine between two floors with reading desks for study purposes is a feature of the interior.

In place of large classrooms, 40 seminar rooms, equipped for discussion, group and teaching purposes, will be provided. Other features are a double gynmasium and a large auditorium with stage and audio visual equipment.

Tenders were called in August 1964 for second-stage construction for the Ontario School for the Deaf at Milton. A \$4,543,000 general trades contract was awarded to the Frid Construction Co. of Hamilton on October 20. This was the lowest of four bids.

The site is on Highway 25, south of Milton. The project will consist of a senior academic school, vocational school, senior boys' and senior girls' residences, and a double gymnasium with connecting swimming pool. When



Aerial view of construction, College of Education, London

this stage is completed it will bring the school's total accommodation to 540.

The first stage of construction at this site was completed a little over a year ago by the same contractor at a \$3,817,000 price. It comprised the junior school, staff residence, hospital, administration, laundry and boiler plant buildings.

For instruction of pupils between 12 and 18 years, the academic school will contain an auditorium and 30 classrooms in a two-storey building. The vocational school will have 10 shops for the teaching of automotive trades, woodworking, upholstery, metal working, etc., in a single-storey, high-ceilinged structure.

The two residences which will house 190 senior boys and 140 senior girls, respectively, are three-storey buildings including partial ground level basements. In addition to the usual residence facilities, the girls' building will also feature a snack bar and a social room for entertaining guests.

A feature of the scheme will be a distinctive covered walkway extending from the dormitories to the academic and vocational wings of the school and to the sports building.

Attractive landscaped courts and rock gardens, paved walks, fountains and terraces will effectively tie the buildings together. A clock tower between the classrooms and the administration wing of the school will serve as a focal point for the building group.

An unusual aspect of the landscaping will be the provision of a pond for nature study, and an artificial hill prepared from the excavation around the area, which will be used by the junior school for tobogganing in the winter.

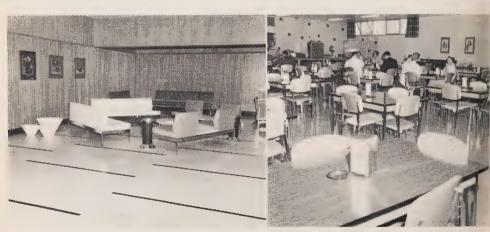
All the buildings will be of brick and precast concrete, exposed aggregate panel construction. A regulation football field and a quarter-mile cinder running track will also be provided. A baseball diamond, three softball diamonds and a soccer field are in future plans. Parking lots will have space for 80 staff and visitors' cars.

#### For The Department of Health

During the past year, \$21,939,734.95 in major contracts for the Department of Health were carried out. On the draughting boards are designs and plans for additional major work that will reach tender call in the ensuing year.

The second phase of the new mental hospital at Palmerston, representing an outlay of \$3,625,949 in general trades contracts, has been completed;





Lounge area

\$11,035,800 is under construction, while contracts totalling \$7.277,985 have been awarded for new works.

Good progress had been made on the second phase of the Palmerston project last year when it reached 60 per cent at the close of the fiscal year. Work continued throughout 1964-65 and the buildings were taken over in February. At the close of this fiscal year, furniture and equipment was being installed and a considerable quantity of small items such as bedsheets, blankets, pillow cases, towels and face cloths had been received.

This new hospital was established to provide care, training and rehabilitation for the mentally retarded from Western Ontario.

The second stage of the project consists of six pavilions, service wing, administration section and connecting tunnels and corridors. (The first stage comprising the power, trades and garage buildings was built the previous year by Anglin-Norcross (Ontario) Ltd. of Toronto for \$490,000). Thirteen major contractors bid for the second phase which was awarded to Ellis-Don Ltd., London, in May 1963 for \$3,625,949. It was described in the previous Report.

In Toronto, the two big jobs are the \$6,663,800 Ontario Psychiatric Institute and the Central Health Laboratory priced at \$4,372,000. The Institute has reached 63 per cent and the Laboratory 76 per cent completion. Both of these works were described last year.

Pigott Construction Co. of Toronto are the contractors for the Psychiatric Institute which is being erected at College and Huron Streets on the west



Advanced construction, Ontario Psychiatric Institute, Toronto



New Central Health Laboratory, Toronto

campus of the University of Toronto. The job consists of a 14-storey tower and connected three-storey research wing. At the fiscal year's end there were 120 men on the job. Estimated completion date will be around the end of 1965.

McNamara Construction of Ontario Ltd., Toronto, are the builders for the new Central Health Laboratory located on Highway 401 between the Islington Avenue cloverleaf and the Ontario Water Resources Commission building on the banks of the Humber River. Wilson and Newton, Toronto, are the associated architects. The project consists of a laboratory and auditorium wing joined by a section containing the main entrance. Approximate total floor area is 174,600 square feet.

Tenders for first-stage construction of the new multi-million dollar Ontario Hospital at London were called in August 1964. The first phase contract went to low bidder Ellis-Don Ltd., London contractors, for \$2,794,000.

Over a period of two years, prior to the contract award, work has been under way on preparation of the site for the new hospital. Plans for the second phase, now on the boards, will include pavilions having 600 beds. It will replace the major part of the out-of-date hospital now on the same grounds.

The site preparation has included some demolition, provision of new



Connecting glass waste lines, Central Health Laboratory, Toronto

entrances and roads and new sewer and electrical services. Further demolition will be carried out during and after construction of the new hospital. The laundry and powerhouse were replaced recently.

The first stage will consist of a central, five-storey medical wing with basement and mechanical penthouse. Single storey administration and occupational therapy wings will be built on each side of the medical wing. Fronting the central core of the medical wing will be a lecture hall.

The whole fifth floor of the medical building will consist of research laboratories relating to biochemistry, serology, bacteriology, haematology and T.B. culture, as well as a general office and staff conference room. A day and night care centre will also be provided.

The first-stage buildings will be devoted to research and teaching for medical staff and nurses. This research and teaching nucleus will be integrated for patient accommodation in second-stage construction of two infirmary wings, each consisting of four pavilions which will be linked to the central core. Bed capacity of these wings will be 600 patients.

A combination of bearing walls and steel frame with pre-stressed concrete floors and roof frame and reinforced concrete foundations will be used in the administration and occupational therapy sections. The exterior will be brick with some precast concrete facing panels.

Brick and precast facing panels and reinforced concrete framing and foundations will be used in the medical building. The penthouse will be clad with vertical alumium panels.

Masonry bearing walls and a combination of reinforced concrete frames, steel joist roof framing with steel decking will be used in the lecture hall. Exterior facing will be precast concrete panels.

All first-phase buildings will have extruded aluminum windows and entrances, terrazzo and resilient floor finishes, plaster and ceramic tile wall



Perspective of Northeastern Psychiatric Hospital, Porcupine

finishes, acoustical radiant metal ceilings, and steel stairs with precast terrazzo treads.

Workmen moved onto the site in mid-October and the first concrete was poured for footings, "A" and "B" wings on October 20. At the end of the fiscal year project had progressed to 10 per cent.

Late in July 1964, tenders were called for the construction of a new mental hospital — to be called the Northeastern Psychiatric Hospital — at Porcupine, near Timmins. McNamara Construction of Ontario Ltd., Toronto, were awarded a \$4,342,000 general trades contract for this work on October 14, 1964. Work started the same month. The project stands at 10 per cent.

The new series of buildings will accommodate 300 patients. They are to be located on a large and pleasant site overlooking Lake Porcupine in Whitney Township, about seven miles east of Timmins, on Highway 101. The institution will be similar to those established at Owen Sound and Goderich during the past few years.

There are two interconnected treatment buildings, each having a central open court. They will be mostly one-storey with some two-storey areas.

Long corridors will be eliminated and the interior decor will feature pastel shades and an extensive use of glass. Ample day rooms and recreational facilities will create a homelike atmosphere. Bright coloured vinyl tile flooring throughout is planned to reduce noise and create a pleasing appearance.

The administration section will be a single-storey block and will include an active treatment wing, kitchen and dining room sections, an auditorium, occupational therapy, and interdenominational chapels.

Linked to this section will be the two-storey wards which will have special treatment bedrooms, quiet rooms and day rooms. A minimum of restriction for patients is planned and easy access has been provided to the enclosed courtyards.

The large infirmary section will be joined by corridor to the service wing and comprises wards and bedrooms, day rooms and dining rooms. A central court will provide relaxation.

Directly behind will be located the T-shaped power, trades and laundry building, a separate garage, and nearby sewage lagoon. Construction will be of brick with some precast concrete. Aluminum sash will be used throughout.

At the Port Arthur Ontario Hospital, a combined trades, garage and implement storage shed building is 75 per cent complete. This was contracted to Michieli Bros., Fort William contractors, for \$141,985. Seven builders, all from Port Arthur and Fort William, bid for the job.

The 115 by 104-foot, one-storey building, will contain a large storage area, locker and lunch rooms and areas for maintenance trades such as carpentry, mechanical engineering, electrical work and painting. There will be a four-bay implement storage section, a three-bay garage and a single-bay heated garage, all with overhead doors.

General maintenance and renovation was carried forward at the many Ontario Hospitals throughout the province. Various buildings at the Ontario Hospital, Smiths Falls, were re-roofed and an addition made to the laundry building. A garage addition for Woodstock is nearing completion. A laundry addition for the Ontario Hospital School at Orillia was finished in October.

Tenders were called early in March 1965 for two additional buildings at the Penetanguishene Ontario Hospital. The buildings are estimated to cost over one million dollars and will be the first-stage in an expansion which will eventually increase the accommodation by 400 beds. Tenders close April 14, 1965.

The two buildings will be almost identical — one housing 100 male and the other 100 female patients. They will be of the "apartment" type for those who are capable of taking care of themselves without constant nursing supervision.

The future pavilion will accommodate an additional 200 patients requiring more intensive treatment. Each of the buildings will be divided into apartments comprising single and two-bed rooms. They will be erected to the northeast of the existing buildings on a beautiful site sloping down to the shores of Georgian Bay.

Each group will have its own living room so that patients will not be in their bedrooms more than necessary. There will be a dining room on each floor opening onto outside patios or balconies. Food will be delivered in



Artist's conception of new buildings for Ontario Hospital, Penetanguishene

heated trucks from the central kitchen in the main building. Small laundry rooms will be provided for patients' personal use, but the bulk of the laundry will be done in the central laundry. Patients will be responsible for the care and maintenance of their own quarters.

Each building will have a floor area of approximately 29,000 square feet. The structures generally will be of reinforced concrete footings with masonry bearing walls supporting open web steel joists. Exterior walls will be face brick with brick back-up, insulation and plaster. Pre-cast concrete spandrel panels and mullions will be used at the windows.

The dark brick and sparkling white panels will provide a sharp contrast in materials and colour to avoid an institutional appearance. Entrance doors and windows will be of aluminum with double glazing. Interior partitions will be of concrete block or structural clay tile and plaster. Walls of bathrooms will be finished with glazed ceramic tile. Dadoes in corridors will be finished with a permanent type of wall coating. Corridor floors will be of terrazzo. Bathroom and servery kitchen floors will be of ceramic tile. Other floors will be vinyl asbestos tile.

Steam from the central heating plant will be brought to the mechanical rooms by underground tunnel where it will be converted to hot water for heating purposes. All main rooms will be ventilated. Telephone, fire alarm and public address systems will be connected to those in the main building. Gilleland & Janiss, Toronto architects, are associate architects on the project.

In various stages of planning are, an Alcoholism and Drug Addiction Research and Treatment Centre for Toronto; alterations to buildings at the newly acquired RCAF Station at Edgar; a regional laboratory for the Ontario Hospital at Palmerston and a clinical services building for North Bay Ontario Hospital.

## For The Department of Highways

For the Department of Highways, two contracts totalling \$1,376,200 are under construction. Two minor contracts worth \$82,195 were substantially completed. These were five-bay metal patrol garages at White River and Young's Point, referred to the previous year.

The big job was for a regional district and office building at Kingston, contracted to John Shore Construction Ltd., Ottawa, for \$939,700 on October 5, 1964.

The "L"-shaped building — 243 by 91 feet at the main core with an 83 by

60-foot addition at the rear — will have a basement, first and second floors and a small mechanical penthouse on the roof.

The building is located on Counter Street, near the 401 Highway, close to the district equipment garage and stores buildings already on the site for the Department of Highways. It will be of steel and masonry construction.

On the main floor will be a large central office, private offices, washrooms and restrooms, first aid room, receiving room and cafeteria. A large land surveys office, administrative offices, staff washrooms and restrooms will be on the second floor.

Contained in the basement will be a large meeting room, library, areas for storage, equipment, printing and filing, boiler room, transformer vault and janitor's supplies.

Stead-Lindstrom Ltd. of Fort William are building a new district repair garage at Fort William for a contract price of \$436,500. This was tendered in October, 1964. Ten contractors bid for the job.

Construction of the new building is on a block of land bounded by Mountain Avenue and Isabella, Walsh and James Streets.

Overall size of this one-storey district repair garage with service bays is 255 by 92 feet. It will be divided into a large storage and stockroom area, offices, toolroom, locker and electrical rooms, male and female washrooms and lunchroom. The service area will have welding and paint spray sections, stockrooms and offices.

Construction will be of exterior face brick and concrete back-up. Interior partitions will be concrete block with the exception of the office and wash-room areas which will have plaster finish. The tar and gravel roof will be supported on steel columns and long-span steel joists. Precast roof slabs will be used for roof decking.

#### For The Department of Lands and Forests

Six small and medium sized projects with a total contract value of \$711,790, begun in 1963-64, were finished and four additional contracts, valued at \$397,790 were started for the Department of Lands and Forests. Planned are district office buildings for Cochrane and Kenora and a chief ranger's office and warehouse for Terrace Bay. The completed works are:

Dorset Forest Ranger School — New dormitory accommodating 90 students. Built by M. Sullivan & Sons Ltd., Arnprior, for \$279,188. It is a three-level project and is essentially completed. All bedroom furniture is installed but some furniture has not yet arrived. Some items remain to be

done by Public Works such as re-locating electrical outlets in all bedrooms, tiling of storage room floors, etc.

DUNNVILLE — Office, Garage and Boathouse. This was essentially completed last year with a few minor exceptions. Lands and Forests personnel moved into the building on May 27, 1964, and final inspections were made on June 3, 1964. It was built at a cost of \$30,885 by B. W. McPherson Construction Co., Dunnville.

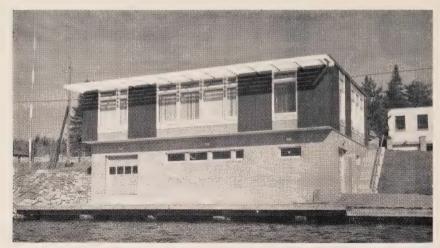
McFarlane Lake (Sudbury) — Chief Ranger's Headquarters. Advanced from 17 per cent last year to a November 1964 completion. It was turned over to Lands and Forests on November 16, 1964. The contract cost was \$195,000. It was built by Carrington Company Ltd. of Sudbury. It was erected near government buildings already on the site known as "Little Queen's Park". The building is single storey, 185 by 110 feet, and is divided into administrative, vehicle storage and repair areas.

SWASTIKA TREE NURSERY — Nursery Office and Shipping Barn. At the end of March, 1964, the project had reached 35 per cent. Final inspection was made on January 4, 1965. Welcon Ltd., Guelph, were contractors for this job at \$91,677. It is a "T"-shaped building with one floor, about 120 by 95 feet, divided into storage and administrative areas.

RONDEAU PROVINCIAL PARK — The Museum for this park had reached 92 per cent at the close of the previous fiscal year. Construction ended before the close of the calendar year. Bruinsma & Sons Ltd., Chatham contractors, were the builders at a \$62,600 price. The Museum is about 85 by 52 feet, single storey, of frame and masonry construction with a stone and wood finish exterior.



New chief ranger's headquarters, McFarlane Lake (Sudbury)



New chief ranger's office and warehouse. Timagami

TIMAGAMI — Chief Ranger's Office and Warehouse. Overall construction at the end of March, 1964, was 32 per cent. It was finished in October of that year. Built at a cost of \$52,440 by Ouellette & Rochefort Ltd. of North Bay it is a 51 by 37-foot building with a basement and ground floor.

All of these buildings were more fully described in the previous report.

Tenders for a chief ranger's headquarters building for Bancroft were called on September 30, 1964. An \$89,352 general trades contract was awarded to Markus & Son Ltd. of Pembroke for construction of this building on November 13, 1964. Work began the same month and it is now 40 per cent completed.

The headquarters building is being located in the Township of Faraday in Hastings County, one mile west of Bancroft on Highway 28. It will be a one-storey structure about 93 feet by 43 feet. It will contain a large general office, offices for the chief and deputy chief rangers, a general draughting and office area, radio room, timber office, conservation office, lunchroom, washroom and locker rooms, boiler and storage areas.

Construction will be mainly brick with panelled siding. Wood will be used in the entranceway to suggest forest products.

The general trades contract for a new maintenance building at Fort Frances went to Bergman & Nelson Ltd., Kenora contractors, for \$71,980. The award was made in June, 1964, and the building completed and taken over by the Department of Lands and Forests in February, 1965.

The 96 by 40-foot one-storey building was erected adjacent to the existing chief ranger's office and warehouse and the district office buildings. It is

divided into three large sections. The garage area has services for motor repair and testing. In addition to a large carpentry shop there are office and stockroom facilities, washrooms, a utility and stores room as well as a boiler room.

A new fish hatchery building for the Normandale Fish Hatchery is nearing completion. Gilvesy Construction Ltd. of Tillsonburg were the builders for a contract price of \$99,564, which was awarded to them in November, 1964. The hatchery building is one-storey, 120 by 30 feet. It will have a workshop, fish food preparation rooms, laboratory, office, garage, storage areas, lunchroom and boiler room.

In this connection a large reconstruction program at the rearing station portion of the hatchery has been completed by day labour forces under the direction of the Civil Engineering Division (Hydraulic Section) of the Department of Public Works.

The erection of the hatchery unit climaxes the large reconstruction program at this hatchery station which is the sole source of Rainbow (Kamloops) trout for the entire province. The design of the rearing station has been a joint effort by the Department of Lands and Forests and Department of Public Works personnel.

A \$136,894 general trades contract was awarded to Kehl Construction Company Ltd. of Harrow on January 29, 1965, for the expansion of facilities of the Department of Lands and Forests fisheries research station just south of Wheatley in Mersea Township.

The project includes construction of a 141 by 44-foot concrete block, onestorey office and laboratory building; a 40 by 25-foot two-storey field equipment and maintenance building; relocation of an existing building to serve as a students' bunkhouse, and a boatslip.

Besides a general office, the largest new unit will have a data processing room, a scientist's office, an examination and aquaria room, a chemistry and microbiology laboratory, dark room, a specimen storage and freezing section, cool room, vaults and boiler room. Research activities will include studies of the population cycles, distribution, movements, diseases, and predators of commercially valuable Lake Erie fish.

### For The Department of Reform Institutions

At the Guelph Ontario Reformatory a large new abattoir is under construction and is about 50 per cent completed. Len Ariss & Company Ltd. of Guelph are the builders of the project which was contracted to them on

May 4, 1964, for \$837,559. Eight major contracting firms bid for the job.

The 180 by 120-foot structure will replace an outmoded abattoir which has been operated at this institution for more than 30 years. The new abattoir will rise two storeys. Construction is of reinforced concrete with brick facing.

The abattoir, when completed, will handle about 300 head of cattle and swine per week. Meat will be used in southwestern Ontario institutions of the Departments of Health and Reforms.

The building will contain large killing and inspection areas and holding pens for cattle brought to the site in advance of slaughter. Hide handling rooms, storage and mechanical equipment will be in the basement.

The \$257,000 program of reconstruction of buildings and dormitories at the Rideau Industrial Farm, Burritt's Rapids, which was 80 per cent done last year, is completed. The work was done by Department of Public Works forces

Early in 1964 a \$15,753 contract was awarded for an addition to the Administration building at the Bowmanville Boys' Training School. This was finished in November.

A \$14,968 contract was awarded Eastwood Construction Company Ltd., Peterborough, for an addition to the swimming pool at the Cobourg Training School for Boys. It was completed in June, 1964.

Being planned are: Construction of buildings and facilities at Brampton to replace the Andrew Mercer Reformatory for women in Toronto; alterations to the former RCAF Station at Hagersville to create a Boys' Training School; the construction of a Boys' Training School in Northern Ontario, probably in the Sudbury area; and the establishment of a building and facilities for a Reception and Diagnostic Centre in Southern Ontario.

Other planning in which the Department is involved includes the Ontario Centennial Project in Metro Toronto; pre-fabricated tourist reception centres at Sault Ste. Marie, Windsor and Homer, near St. Catharines, for Tourism and Information; an office building at Kenora for Mines and a field centre at Port Arthur for the Department of Transport.

### For The Ontario Government Exhibits

On the evening of August 20, 1964, Prime Minister John Robarts officially opened the Province of Ontario Building in Exhibition Park. Hundreds

attended and enjoyed the preview of governmental exhibits. Refreshments were supplied and the colourful Garrison Band from famed Fort Henry in Kingston played music for the event.

The Canadian National Exhibition was held from August 21 to September 7. The Department of Public Works prepared the Province of Ontario Building for this annual occasion, working in close liaison with the various exhibiting departments.

Painting, carpentry work, floral and evergreen decorations and special feature lighting required to make suitable settings were provided, in addition to staff for supervision and maintenance of the whole in excellent condition during the 15-day run of the Exhibition. As in former years, the movie theatre presented hour-long films of universal interest, daily. It was equipped, staffed and managed by the Department of Public Works.

Exhibiting were the Departments of Agriculture, Attorney General, Economics and Development, Education, Energy and Resources Management, Health, Highways, Labour, Lands and Forests, Mines, Municipal Affairs, Reform Institutions, Transport, Tourism and Information, Water Resources, Ontario Hospital Services Commission, Provincial Secretary and Citizenship and the Provincial Archivist.

The Central Canada Exhibition was held in Ottawa from August 21 to August 29. The Department of Public Works organized and prepared the Ontario Government display areas to produce a combined exhibit that received much commendation. Particular attention was paid to the construction of a new-type circular fish and wildlife exhibit for the Department of Lands and Forests. Installation and maintenance of all mechanical services, interior redecoration, exhibit settings and sign work for the government departments exhibiting was supplied by the Department of Public Works.

Displays were prepared by the Departments of Agriculture, Attorney General, Economics and Development, Education, Health, Highways, Labour, Lands and Forests, Reform Institutions and Transport.

#### **BOILER INSPECTION**

The boiler inspection work of this Department, as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training

Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs as to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario Hospitals and Reformatories, the reports as referred to were sent to the Departments of Health and Reform Institutions, respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir

Your obedient servant.

A Stareto

D. G. Creba,

Chief of the Architects' Branch.

Toronto, March 31, 1965.

#### Report of the Manager, Real Estate Branch

Parliament Buildings, Toronto, Ontario, March 31st, 1965.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

I have the honour to report the work accomplished by the Real Estate Branch, Department of Public Works, during the fiscal year April 1, 1964 to March 31, 1965 which was the first full year of the Real Estate Branch as a three-division Branch; the divisions being the Property Division, Land Surveys Division and Office Accommodation Division.

The Office Accommodation Division, under the direction of G. S. Laws, is currently finalizing the allocation of space in the new Queen's Park project, together with the re-allocation of the space vacated. To provide information on proper utilization of Government owned and leased premises the Office Accommodation Division has started space analysis surveys of all such premises both in Metro Toronto and throughout the province which will also provide valuable information for the Property Directory and to further assist the Property Division in leasing new premises. The staff of the Office Accommodation Division has been increased from three in 1963 to an approved complement of 16 in 1965.

The Property Division, under the direction of W. G. Bentley, Chief Property Officer, continues its acquisition of lands for the various Depart-



Leased property — O.P.P. detachment building, Madoc

ments, Boards and Commissions of the Government, with particular effort being made during the last fiscal year on the expanding parks programme of the Department of Lands and Forests and the most necessary work in connection with A.R.D.A. projects.

The Land Surveys Division, under the direction of G. B. Wright, Chief Surveyor, sees that the necessary plans and descriptions are prepared, not only for acquisitions for various Departments of the Government, but in preparing Master Survey Plans of all Government holdings. The Land Surveys Division, during the fiscal year ending March 31, 1965, completed 156 requests for survey information, together with topographical surveys carried out to provide plans to the Architects' Branch suitable for the designing of buildings and allied services. The Land Surveys Division provided complete site survey coverage of the property at Don Mills Road and Eglinton Avenue, used in the design of the Museum of Science and Technology, to be erected as part of the Province of Ontario contribution to the Centennial celebrations.

The Property Directory, which is a combined effort of all Divisions, but the direct responsibility of the Property Management Section under the direction of Mr. L. W. Griffith, is, as stated in previous reports, an index of all Government-owned and leased premises and is subject to monthly corrections. Recently, the first major revision was completed and copies have now been returned to all Departments for their use.

The following is a general summary of the work completed by the Divisions of this Branch during the fiscal year 1964-65:

#### PROPERTY DIVISION

221 purchases		\$2,936,830.14
218 leases		5,319,066.96
35 sales		174,688.45
474 items	_	\$8,430,585.55

#### **Appraisals**

Conservation Authorities	_	31 parcels		\$942,706.50
Water Lots		3 parcels		30,800.00
Other Valuations		14 parcels		45,315.00
			_	\$1,016,821.50

#### **Property Management Section**

Payment of Rent — Canadian Funds — \$2,690,987.12 — U.S. Funds — 23,754.00 — Italian Lire — 4,017,862 lire — German Marks — 18.000 marks

 Revenue from Property
 — \$1,044,423.77

 Taxes Paid
 — 16,111.96

 Insurance Paid
 — 82.881.06

#### LAND SURVEYS DIVISION

Projects assigned — 211 Projects completed — 156

#### OFFICE ACCOMMODATION DIVISION

 Projects assigned — 176
 Projects completed — 158

 158 completed — 588,491 sq. ft. — staff, 3,587

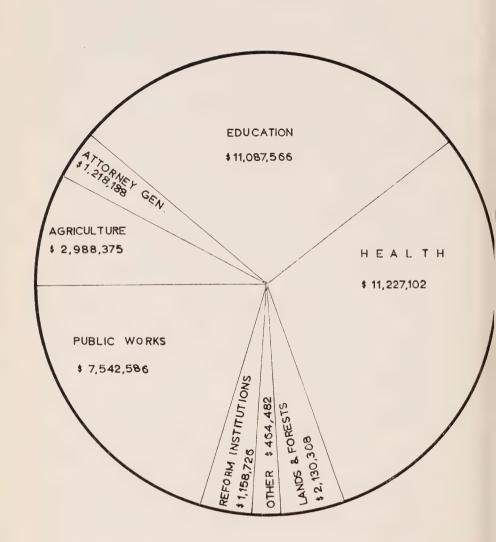
 18 not completed — 258,964 sq. ft. — staff, 1,388

Respectfully submitted.

E. J. Parker, Manager, Real Estate Branch.

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# ONTARIO DEPARTMENT OF PUBLIC WORKS CAPITAL EXPENDITURES 1964-65



NEW CONSTRUCTION and CAPITAL IMPROVEMENT \$37,817,333 (GROSS)

### Report of the Chief of the Accounts Branch

Department of Public Works, Ontario, Toronto, March 31, 1965.

MR. J. D. MILLAR,

Deputy Minister of Public Works,

Parliament Buildings,

Toronto, Ontario

#### SIR:

The following statements cover the monies received and disbursed on behalf of the Department of Public Works, Ontario, for the fiscal year which ended on March 31, 1965. The increase in Ordinary Expenditure was due mainly to the additional amounts expended on Government Buildings, Maintenance and Repairs and on Leased Premises. In the former, retroactive pay increases accounted for over \$100,000, the expansion of communication services for over \$200,000, and the cost of maintenance and repair items for over \$300,000. In the latter, the expansion in the number of leased premises together with associated costs accounted for approximately \$980,000. The increase in Capital Disbursements reflected the increased expenditures on the construction of Public Buildings.

Respectfully submitted,

Chief of the Accounts Branch.

## Report of the Department of Public Works

Fiscal Year Ending March 31, 1965

#### REPORT OF THE ACCOUNTANT

The following figures show an increase in the operations of the Department over the previous year:

#### **EXPENDITURES**

Fiscal Year 1964-65 1963-64	\$13,781,548.27		Total \$50,909,431,06 41,554,279.89	
Percent Increase	\$ 1,648,770.65	\$ 7,706,380.52	\$ 9,355,151.17	
	13.59%	26.19%	22.51%	

#### SUMMARY OF EXPENDITURES For Fiscal Year April, 1964 to March 31, 1965

101 Histar Tear April, 1704 to March 61, 1705				
Service	Ordinary	Capital	Total	
Main Office —				
Administration	© 1 127 052 41		0 1 126 052 41	
expenses, etc.	\$ 1,136,853.41		\$ 1,136,853.41	
Maintenance and Repairs — Government Buildings	9,278,983.07		9,278,983.07	
Leased Premises —	9,270,903.07		9,270,903.07	
Rentals, etc.	3,172,083.83		3,172,083.83	
Public Works — Dams,	-,,		2,1.2,000.00	
Docks, Locks, etc.	102,336.16	973,322.77	1,075,658.93	
Public Buildings		36,154,560.02	36,154,560.02	
Miscellaneous	91,291.80		91,291.80	
	\$13,781,548.27	\$37,127,882.79	\$50,909,431.06	

#### STATEMENT OF REVENUE

Commissions on			
Telephones	\$ 8,429.07		\$ 8,429.07
Sale of Material	30,283.54	\$ 1,805.00	32,088.54
Rentals	1,229,298.32		1,229,298.32
Perquisites	1,759.61		1,759.61
Building Equipment	1,944.95		1,944.95
Miscellaneous	2,237.04		2,237.04
Sale of Property	Ť	76,954.90	76,954.90
Plan and Contract		ĺ	
Security Deposits		3,506.03	3,506.03
	\$ 1,273,952.53	\$ 82,265.93	\$ 1,356,218.46

# Statement of Expenditures, Main Office Maintenance, Repairs and Construction of Public Buildings

#### For Fiscal Year Ending March 31, 1965

#### ORDINARY

Service	Amount	Amount
MAIN OFFICE Minister's Salary. Salaries. Travelling Expenses. Maintenance. Insurance Unforeseen and Unprovided. Compensation — Medical, etc. for Injured Workmen. Unemployment Insurance.	\$ 12,000.00 761,758.09 7,102.26 112,398.21 86,441.66 81.80 108,527.31 48,544.08	
		\$ 1,136,853.41
ONTARIO GOVERNMENT BUILDINGS Salaries — Maintenance Staff	\$ 3,640,962.00 1,000,443.93 1,194,462.70 71,728.22 3,374,386.22 \$ 9,281,983.07 3,000.00	© 0.279.092.07
LEASED DREWISES		\$ 9,278,983.07
Rentals and Expenses		\$ 3,172,083.83
MAINTENANCE OF LOCKS, BRIDGES, DAMS AND DOCKS, ETC. Maintenance		\$ 102,336.16
MISCELLANEOUS Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith	\$ 59,392.70	

#### **ORDINARY (Continued)**

Service	Amount	Amount
Aid — Remedial Works, etc — Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection with therewith as may be directed by the Lieutenant-Governor in Council.  Municipal Drainage, including grants in aid thereof.	30,830.30 1,068.80	
		6 01 201 90
TOTAL ORDINARY EXPENDITURE		\$ 91,291.80 \$13,781,548.27
CAPITAL		
PUBLIC BUILDINGS		
To provide for the construction of new buildings and works, purchase of lands and buildings, alterations equipment and extension of services to existing buildings and works and the purchase of construction plant and equipment and materials for stores and expenses in connection therewith.		\$26.154.560.02
		\$36,154,560.02
Construction of Dams, Docks and Locks		973,322.77
		\$37,127,882.79
SUMMARY		
ORDINARY EXPENDITURE		
Main Office, Maintenance and Repairs of Government Buildings		\$13,781,548.27
CAPITAL DISBURSEMENTS		
Public Buildings and Public Works		37,127,882.79
		\$50,909,431.06

D. WALKER, Chief of the Accounts Branch.

TORONTO, March 31, 1965.

## Report of the Chief of the Civil Engineering Division

Parliament Buildings, Toronto, Ontario, March 31, 1965.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

The work performed under the supervision of the Chief of the Civil Engineering Division during the fiscal year 1964-65 was as follows:

#### 1. HYDRAULIC SECTION

#### (A) DAMS, DOCKS, LOCKS, ETC.

#### SUMMARY:

The investigation, pre-engineering, design, construction, inspection and approval of the work on dams, docks, locks, etc., was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas.

One concrete dam, one timber dam and one trout rearing station, previously commenced, were completed. One concrete dam, previously commenced, was proceeded with. Three concrete dams, one timber dam and one timber dock were started and completed this year. Work on three concrete dams, one timber dam and one concrete dock was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

#### BIG TROUT LAKE DAM, Bishop Township, Nipissing District

Reconstruction of the dam at the outlet of Big Trout Lake in Algonquin Park, which was commenced last fiscal year, was completed.

The new dam is of crest overflow type. It consists of two rock filled timber crib structures one of which is located at the main outlet of the lake, another



Twin-crest overflow dams, Big Trout Lake Dam, Nipissing

at a secondary outlet nearby. The total length of the discharge crest of both structures is 272 feet and the structural height of the cribs is from seven feet to 10 feet.

#### BROADWELL LAKE DAM, Hardy Township, Parry Sound District

Reconstruction of the dam at the outlet of Broadwell (Rainy) Lake, started last fiscal year, was completed.

The new reinforced concrete dam is based on solid rock. It is 78 feet long and consists of one 14-foot sluiceway and a crest overflow wing wall. The head of water measured from the sluiceway sill to the controlled water level is eight feet and the top of the deck is three feet above this level. The sluiceway is fitted with steel chases and timber stoplogs. A pair of stationary gear winches operate the stoplogs.

#### CEDAR SPRINGS, ONTARIO HOSPITAL SCHOOL

The rock-filled timber crib shore protection in front of the water pumphouse had been underwashed, causing it to tilt outward towards the lake. To prevent further deterioration with its danger to the stability of the pumphouse, extensive additional protective works were designed. This consisted of a steel sheet piling wall tied back to the existing steel sheet piling around the pumphouse, with steel rods and turn-buckles. The space between the new wall and the old wood crib was filled with stone and a top dressing of stone placed over the entire area. The wash water and drain outlet lines had to be relocated to tie in with the new steel sheet piling wall. The design was developed by Proctor and Redfern, Consulting Engineers, and the contract

was carried out by George L. Dillon Construction Co., Limited. Work began in November, 1963, and was completed in July, 1964.

### LAKE COUCHICHING DOCK at ONTARIO ATHLETIC LEADERSHIP CAMP Longford Mills, Rama Township, Ontario County

Construction of one permanent dock with two attached floating sections as an addition to the existing system of docks, was requested by the Department of Education for instruction of swimming classes and for landing of boats.

This Spring, the site was dewatered and a reinforced concrete dock 55 feet long and 14 feet wide was constructed.

#### **DURHAM DAM, Glenelg Township, Durham County**

An old mill dam on the Saugeen River in the Town of Durham was considered to be unsafe and a new dam was requested by the Department of Lands and Forests.

The new dam will hold back water to form a pond of approximately 30 acres which will be used by the Saugeen Valley Conservation Authority for recreational purposes.

Work on the reinforced concrete and earthfill structure commenced in March 1964. The dam contains six spillways, five of which use timber stoplogs for control of the water level. The sixth spillway will have a steel radial gate capable of automatic or manual operation for close regulation of the reservoir level. The differential in water level between the upstream regulated water level and the normal downstream water level is 15 feet six inches and the overall height of the dam is 28 feet. Earthfill wingwalls extend from each end and key into the existing embankment giving an overall length to the dam of 350 feet. Concrete and part of the earthfill work was finished this fiscal year. Final grading of the fills and installation of the automatic gate mechanism will be completed early next season.

#### FROOD LAKE DAM, Curtin Township, Sudbury District

The existing concrete dam at the outlet of Frood Lake, installed by this Department in 1950, had deteriorated to a considerable extent. In addition, it could not satisfactorily pass the runoff from the large (365 square miles) drainage area above the dam and this caused excessive flooding of the lake. In 1964, the Department of Lands and Forests requested reconstruction of the dam. This year, a construction camp was erected, concrete aggregates were brought in and rock excavation for foundation was carried out. Construction work will begin next season.

#### LAVIEILLE LAKE DAM, White Township, Nipissing District

The existing timber crib dam at the outlet of Lavieille Lake was built by this department in 1950. In 1964, it was found to be deteriorated beyond repair and the Department of Lands and Forests requested reconstruction of the dam. This year, the access road to the site was improved, a construction camp erected, driftwood cleared from the flow channel and timber cut in the vicinity of the dam and brought into the site. Construction work will commence next fiscal year.

#### LONGBOW LAKE DAM, Kirkup Township, Kenora District

Eighty-eight new wooden rollers were installed in the boat portage of the dam. Minor maintenance work on the boat dock and walkway was also carried out

#### MAGNETAWAN DAMS and LOCKS, Chapman Township, Parry Sound District

The westerly part of the system of dams and locks at Magnetawan was dewatered and overhauled. The 50-year-old masonry of the piers and walls was pointed with cement mortar, and concrete parts of the structures were repaired where necessary. The westerly wingwall was partially reconstructed with concrete.

#### MANITOU RIVER DAM, Rainy River District

Repairs were made to the concrete piers of the dam which had been eroded at the upstream noses and in the area of the stoplog gains.

#### MARTEN RIVER DAM, Sisk Township, Nipissing District

The dam controlling the outflow from Marten Lake was originally built by lumbering interests for log driving through a series of rapids in Marten River between Marten Lake and Red Cedar Lake. The original rock and timber dam had deteriorated and in 1963 the Department of Lands and Forests requested reconstruction. The new dam will hold a constant water level on upper and lower Marten Lakes; the latter is the main body of water in Marten River Provincial Park.

Work on the reinforced concrete structure was started in July, 1964. The dam is founded on rock and contains four 14-foot sluiceways plus a parabolic overflow wall 90 feet long; total length of the dam is 210 feet. The head of water, measured from the sluiceway sill to the regulated water level, is seven feet and the operating deck four feet six inches above this level. Total height of the dam from the bottom of the foundation to top of

deck is 19 feet. The sluiceways are fitted with steel stoplog gains and are controlled by timber stoplogs.

Concrete work was completed this fiscal year; earth fills, final grading and landscaping will be carried out early next season.

#### FISHWAY at NICOLSTON DAM, Essa Township, Simcoe County

Timber decking on steel beams was installed at the centre of the fishway for passage of vehicles.

#### PROVINCIAL FISH HATCHERY, NORMANDALE, Charlotteville Township, Norfolk County

Work on the rearing station portion of the above hatchery which started in November 1963 continued during 1964. Reinforced concrete structures comprising eight circular ponds 25 feet in diameter, two 50-feet-long raceways, two dams and a retaining wall were constructed. In addition, a 200-feet-long pond was constructed between the dams. All piping for supply and waste water was installed along with the necessary manholes and catch basins. A 20 feet by 16 feet pumphouse was built to house the pump units for the hatchery water supply and a domestic water supply system was installed. Intake and diversion flumes were erected in the existing stream bed for controlling the spring water supply.



Spawning tanks at Normandale Fish Hatchery



Circular ponds at the Normandale Fish Hatchery

#### NOSBONSING LAKE DAM, Bonfield Township, Nipissing District

The dam at the outlet of Nosbonsing Lake was originally built in 1920 by the Canadian Pacific Railway to maintain adequate supply of water for trains. With the passing of the steam engine, need for water by the railway no longer existed but a stablized water level in the lake was necessary for the many tourist resorts and summer homes which had been built in the area. In 1963, the Department of Lands and Forests requested reconstruction of the dam.

The new reinforced concrete dam rests on solid rock. It is 320 feet long and consists of one 14-foot sluiceway and a 230-foot long crest overflow wall. The head of water, measured from the sluiceway sill to the regulated water level, is six feet and the operating deck is four feet above this level. The sluiceway has steel chases and timber stoplogs. A pair of stationary gear winches operate the stoplogs.

#### PESHU LAKE DAM, Township 5D, Algoma District

Major repairs were made to the existing timber dam. The deteriorated timber in the upper layers of the cribwork was renewed and the deck of the dam reconstructed.

#### PORT CARLING DAM and SMALL LOCK, Medora Township, Muskoka District

A permanent control building for operation of the small lock was erected in May 1964, completing the reconstruction of the dam and small lock. The control building is a single-storey structure of reinforced concrete and wood trim. It is 16 feet long and 10 feet six inches wide. The front half of the building houses the control console from where the lock operator controls the lock. The rear portion of the building houses the power, standby, and control units necessary for the lock operation.

#### DAM at EARL ROWE PROVINCIAL PARK, Tosorontio Township, Simcoe County

Site preparation, including cutting and piling of approximately 40 acres of timber in the flooded area, was carried out during the winter months of 1963-1964, with actual construction work on the dam starting in April of 1964.

The new dam is a reinforced concrete and earthfill structure 320 feet long, consisting of three 14-foot sluiceways and reinforced concrete and earthfill wingwalls. The differential head of water maintained by the dam measured from the upstream regulated water level to the normal downstream water level is 16 feet and the overall height of the dam is 28 feet nine inches. The deck of the dam incorporates a two-lane access road. Timber stoplogs and movable gear winches are provided for regulation of the water level in the 84-acre reservoir.

To allow for the natural migration of trout up the Boyne River, a pool and weir type reinforced concrete fishway was constructed adjacent to the downstream south concrete wingwall of the new dam.

A steel slide gate with reinforced concrete head wall was constructed in the old mill-race south of the new dam to provide a source of water for a projected water wheel operation.

The north earthfill wingwall was left unfinished in order to maintain a bypass around the new dam and a low water level in the Boyne River during the summer of 1965. This was necessary in order that proposed excavation work in the reservoir area may be carried out. Upon completion of the excavation work, the earthfill wingwall will be finished.

#### DOCK at SIOUX LOOKOUT AIR BASE, Kenora District

A new dock was constructed at the Department of Lands and Forests Air Base, Sioux Lookout.



New timber pile dock, Air Service Base, Sioux Lockout

#### ST. WILLIAMS NURSERY DAM, Walsingham Township, Norfolk County

The existing timber and concrete dam located on Spring Creek had deteriorated to such an extent that reconstruction was requested by the Department of Lands and Forests. The old dam maintained a one-acre pond on the Nursery property and was used for public fishing, the pond being restocked regularly.

The new dam was constructed in reinforced concrete and earthfill and contains one 14-foot spillway. The water level differential between the regulated head pond level and the normal tail water level is nine feet two inches and the overall height of the dam is 15 feet six inches. The overall length of the dam is approximately 70 feet. Work on the dam started on August 22nd, 1964 and was completed on November 28th, 1964.

#### TEA LAKE DAM, Peck Township, Nipissing District

The dam at the outlet of Tea Lake, which also controls the water levels in Smoke Lake and Canoe Lake, was originally installed by lumbering interests around 1900 and was reconstructed with concrete by this Department in 1928. In 1963, the dam was found to be deteriorated beyond repair. This fiscal year, it was reconstructed with reinforced concrete and the new dam was put in operation on November 13, 1964.

The new dam is a curved gravity-type structure, based on solid rock. It is 200 feet long and comprises two 14-foot sluiceways, a 36-inch by 36-inch steel valve and a crest overflow wingwall with a 100-foot long crest. The head of water measured from the sluiceway sill to the regulated water level is nine feet and the top of the deck is four feet above this level. The total height of the dam from foundation to the top of the deck is 13 feet.

#### WAKOMATA LAKE DAM, Township 188, Algoma District

The existing old timber crib dam at the outlet of Wakomata Lake was partially reconstructed with timber and transformed into a crest overflow dam with a 214-foot long crest. Thus the discharge capacity of the dam was considerably increased and the lake level stabilized at the desirable elevation.

#### CURRENT REPAIRS AND MINOR CONSTRUCTION WORK:

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the over-hauling of stoplogs, winches and painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Baptiste Lake Dam, Hastings County; Blind River Dam, Algoma District; Brightwater Lake Dam, Nipissing District; Dollars Dam, Sudbury District; Feighen's Dam, Parry Sound District; Finlayson Dam,

Nipissing District; Frood Lake Dam, Sudbury District; Kearney (Ayers) Dam, Parry Sound District; Sand (Westport) Lake Dam, Leeds County; Sasajewan (McCoy) Lake Dam, Nipissing District; Tube Lake Dam, Algoma District.

#### GENERAL:

Minor repairs, adjusting of winches, painting of steel parts, replacing of stoplogs, etc., were made to 34 dams which are not listed above. Timber protection booms and safety cables were repaired, replaced or adjusted where required. Driftwood and beaver dams were removed from 28 dams

#### (B) WATER CONTROLS AND NAVIGATION

#### WATER LEVELS:

Water Levels in the Muskoka and Parry Sound Districts were successfully controlled by the Water Level Control Supervisor at the Huntsville Office, judging from the very few complaints received from the many interests concerned.

#### NAVIGATION AIDS:

Two Hundred and Seventy drum buoys, 80 spar buoys and 23 warning sign floats were placed in Lakes Muskoka, Rosseau and Joseph; and connecting rivers and channels; 56 drum buoys and 3 spar buoys were located in the Huntsville area lakes, Muskoka River and connecting channels; 53 drum buoys were place in Lake Cecebe, Ahmic Lake and Magnetawan River; all important channels were kept clear of floating and submerged logs, debris, etc., and safety booms and cables were placed and maintained in front of all dams; painting of dam railings, winches, stoplog opening frames and covers was carried out at all dams and locks as required; landscaped dam and lock sites were maintained by pruning trees and bushes, cutting grass, etc.; picnic tables were obtained and placed at Port Carling, Huntsville Locks and Baysville dam sites; "fast water" and "water speed" warning signs as well as other public regulating signs were placed at required locations.

#### (C) LOCKAGES

The records of watercraft which were passed through the locks operated by the Provincial Government were as follows:

Port Carling Huntsville Magnetawan	_ _ _	Boats over 30 ft. in length 3,931	Small Boats 11,429 1,182 351	Scows 2	Total 15,362 1,182 352
		3,931	12,962	3	16,896

#### 2. REMEDIAL WORKS

The following grants were paid to Municipalities for completed flood relief work: Coniston, Sudbury District, \$16,115.40; M. M. Dillon Co. Engineering Services re above, \$365.55; Township of Baldwin, Sudbury District, \$418.95; Township of Teck, Temiskaming District, \$7,887.65; Armstrong Bros. Flood Relief Work on Credit River at Glen Williams, \$6,408.30. Several applications were investigated and grants approved, to be paid after the completion of the work.

#### 3. MUNICIPAL DRAINAGE

Several applications for Municipal Drainage grants were investigated during the year, and one payment was made on a completed project; Township of Tay, Simcoe County \$1,068.80.

#### 4. ROADS AND LANDSCAPING SECTIONS

#### SUMMARY:

New construction, repair and improvement work on roads, sidewalks, curbs, parking areas, etc., involved an expenditure of \$233,051.06; and on landscaping, athletic sports fields, field drainage, etc., \$41,388.56; 14 projects costing more than \$10,000.00 each are listed below:

#### DEPARTMENT OF AGRICULTURE

GUELPH — Federated Colleges: Completion of contract for road and parking area paving and replacing sidewalk commenced last year — additional expenditure — \$3,826.

#### DEPARTMENT OF ATTORNEY GENERAL

AYLMER — Ontario Police College — Reconstructing roads and ditching, paving etc. — \$9,132. (to be completed next year).

#### DEPARTMENT OF EDUCATION

BELLEVILLE — Ontario School for the Deaf — Construction of a storm sewer for field drainage, etc., commenced last year — additional expenditure — \$2.608.

#### **DEPARTMENT OF HEALTH**

ONTARIO HOSPITAL, BROCKVILLE — Widening main entrance from Highway No. 2 and constructing parking areas — \$23,451.

ONTARIO HOSPITAL, CEDAR SPRINGS — Landscaping of Play Area — \$17,001.32. Completion of road shoulder stabilization, drainage and landscaping contract commenced last year — additional expenditure — \$5,570.

ONTARIO HOSPITAL, KINGSTON — Enlargement of parking area at Administration Building — \$20,132.

ONTARIO HOSPITAL, LONDON — Repairs to parking areas, and roads around Power House, Kitchen and Laundry — \$19,340.

ONTARIO HOSPITAL, PORT ARTHUR — Road and parking area — completion of contract commenced last year — additional expenditure — \$6.746.

ONTARIO HOSPITAL, WHITBY — Widening and resurfacing roads, new sidewalks and curbs — \$18,620.

Widening and resurfacing entrance road and repairs to sidewalks and curbs — \$20,441.

#### DEPARTMENT OF LANDS AND FORESTS

CHATSWORTH FISH HATCHERY — Completion of new road contract commenced last year — additional expenditure — \$20,146.85.

WHITE RIVER — CHIEF RANGER'S OFFICE ETC. — Construction of roads and parking area — \$14,945.

#### DEPARTMENT OF PUBLIC WORKS

McFARLANE LAKE — ONTARIO GOVERNMENT BUILDINGS — Paving entrance road — \$21,166.

#### **DEPARTMENT OF REFORM INSTITUTIONS**

SIMCOE — Boys' Training School — Construction of Athletic Sports Field, commenced last year — additional expenditure — \$1,100.00.

#### GENERAL

Specifications and drawings for many general contracts were checked with reference to roads, etc., and landscaping work, and some were designed or re-designed. Twenty contracts under \$10,000 in value were prepared and executed for Departments as follows: Agriculture, 1; Attorney General, 3; Education, 4; Health, 3; Lands and Forests, 1; Reform Institutions, 6; Transport, 1; Tourism and Information, 1.

Respectfully submitted,

W. Z. Rice

W. L. Rice, P.Eng., Chief of the Civil Engineering Division.

# Report of the Chief of the Sanitary Engineering Division

Parliament Buildings, Toronto, Ontario, March 31, 1965.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works

Throughout the past fiscal year, all of the existing sanitary installations which consist of waterworks systems, sanitary and storm sewers, sewage treatment plants, pumping stations, etc., at all the various hospitals, schools and other institutions in the Province, were maintained in good operating condition.

At the Ontario Hospital, New Toronto, a second eight-inch cast iron water service was installed from the Toronto Township 16-inch watermain at the east end of the hospital property and connected to the watermain loop around the buildings. An underground concrete meter chamber was constructed and provided with a suitable water meter on the new service, adjacent to the existing 16-inch Township main. All of the existing fire hydrants were brought up to standard.

Reconstruction of the storm sewer system at this hospital was also carried out on the same contract. This work was necessary to provide a storm trunk sewer outlet into adjacent Lake Ontario and to separate and remove storm water lines from the sanitary sewer system. The sewer construction involved the laying of 3,000 lineal feet of sewer from six-inch diameter to 16-inch diameter.

At the Department of Lands and Forests Air Service buildings in Sault Ste. Marie, both the sanitary sewage and storm water were previously discharged into the adjacent St. Mary's River. Because the city recently completed a sewage treatment plant it was possible to construct a separate sanitary sewer.

The surplus elevated steel water tanks at the Main Camp of the Industrial Farm, Burwash, and the Boys' Training School, Bowmanville, were both dismantled. It was not necessary to clean and paint any of the existing elevated water tanks, during the year, since all were in good condition, but minor emergency repairs were carried out on one tank.

Adequate services were provided to suit the respective requirements for all new building projects as outlined in the Chief Architect's Report.



Dismantling elevated steel water tower, Boys' Training School, Bowmanville

At the University of Guelph, an 80,000 Imperial gallon underground reinforced concrete raw water reservoir has been constructed and put in operation. This reservoir is on Power House Lane across from the power house. It is connected by a 12-inch cast iron water main to the existing small raw water reservoir under the power house floor. The new reservoir was necessary to use the production of the large deep wells which are the water source; also because of increased water consumption together with consideration of future growth of the University.

Also at the University of Guelph, a six-inch cast iron water main loop, 2,000 lineal feet in length, was constructed around the MacDonald College buildings, Watson Hall and the site for the proposed 400-bed Mens' Residence. The main is connected at either end to the eight-inch watermain on College Avenue and will provide adequate domestic water supply and fire protection to these buildings. During the installation certain necessary revisions were carried out to the original watermains and water services in this area.

At the Horticultural Experimental Station, Vineland, the eight-inch irrigation main was extended 3,000 lineal feet to provide facilities for recently acquired farmlands on the south side of the Queen Elizabeth Way. A new, larger, higher head irrigation pump was purchased and placed in operation.

To serve the new Provincial Police Detachment at Dutton with water for domestic use and fire protection, it was necessary to enter into an agreement with the Village and the Public Utilities Commission for the construction of a six-inch cast iron watermain about 1,000 feet northerly from the Village limits to the Detachment.

In order to provide more adequate drainage to the Ontario Provincial Police Detachment at Kapuskasing a 16-inch diameter storm sewer, 2,000 feet in length, was constructed westerly along Highway No. 11 where it discharges into a large concrete culvert. The necessary catchbasins were provided, with other appurtenances, in the detachment property. The unusual length of sewer was necessary due to the topography at this location.

The new Ontario Provincial Police Detachment at Napanee was built on the west side of Highway No. 41, near the northern boundary of the town and 2,600 feet beyond the termination of the Town services, adjacent to the C.N.R. main line. Since there are only five to six feet of earth above bed rock, and water cannot be obtained by drilling a deep well, an agreement was entered into with the Town and the Public Utilities Commission to extend the sanitary sewer and water services to serve the Detachment.

During the construction of the Ontario Provincial Police Detachment at Thessalon, a pre-fabricated extended aeration sewage treatment plant, having a capacity of 2,000 U.S. gallons per day, was provided. The plant final effluent is chlorinated and is discharged into the adjacent Thessalon River. This type of sewage treatment was decided upon after a thorough examination of the local conditions which were found to be unsatisfactory for the installation of a conventional septic tank with disposal field.

The outside services, which are rather extensive, at the new Ontario College of Education, London, now under construction, are 90 percent completed. The City of London is building both a trunk sanitary and a trunk storm sewer to serve the adjacent University Heights subdivision. These trunk sewers are scheduled for completion early this summer and when they have been installed the respective College trunk sewers will be connected to them.

The construction of Stage II buildings at the Ontario School for the Deaf, Milton, which began several months ago, is progressing. The outside services for these buildings is keeping pace with building construction and will be completed, it is expected, in June.

The Ontario Hospital, Cobourg, was formerly served by a combined sewer which discharged into the town sewer on University Avenue. Recently, due to paving of parking lots and roads, it was noted that during severe storms of heavy rain, the sewers backed up, causing flooding in the hospital basement. To rectify this situation, 2,000 lineal feet of storm sewers, six-inch to 15-inch in diameter, were constructed with all necessary manholes and other appurtenances. The sewer terminates in a town storm sewer manhole on Monroe Street. This construction separated and removed all storm water and roof water from the former combined sewer.

The Ontario Hospital School in Gravenhurst was formerly a tuberculosis sanatorium.

The existing sewage treatment plant is of a modern type, designed to handle a flow of 40,000 gallons per day, but was rendered inadequate when the sewage flow doubled. This was caused by an increase in the number of patients and because the water consumption per patient in this type of hospital, greatly exceeds that of a sanatorium. As a result of this high flow, the effluent which discharges into Lake Muskoka became highly unsatisfactory. To rectify this condition a second treatment plant was designed, constructed and placed in operation late last Fall. The new treatment works provides twin units of "total oxidation", operating parallel with each other and parallel with the original plant, thus creating an efficient system of



Control House, sewage treatment plant, Ontario Hospital School, Gravenhurst

treatment for the existing hospital load. The plant effluent is chlorinated and discharged through a 700-foot-long outfall sewer into Lake Muskoka at a depth of 35 feet. A large underground concrete holding tank was also constructed into which the laundry wastes are discharged thus permitting an even flow to treatment works, eliminating the previously experienced shock loads.

Reconstruction of the Ontario Hospital, London, was commenced and was designed to be effected in two stages. This construction involves the demolition of the existing buildings and the construction of new, modern buildings on the same property. In view of this, it was necessary to redesign the water distribution system, the sanitary sewer and the storm sewers so that these services would function for the existing buildings until demolished and also provide for all the requirements of the new buildings without interruption to service. This construction was completed prior to the commencement of the Stage I building contract. Stage I of the building program was started about three months ago and is progressing favourably.

The construction of the new North-eastern Psychiatric Hospital at Porcupine, seven miles east of Timmins on Highway No. 101, was commenced during the winter. This contract includes the installation of all the outside services which consist of sanitary sewers and sewage disposal, a storm sewerage system and water supply and distribution. Sanitary sewage disposal will be facilitated by a suitably sized sewage lagoon. The trunk storm sewer will discharge into the ajdacent Porcupine River. Water supply is being provided by Golden City, Township of Whitney, which has a supply main suitably located on the highway at the south-east corner of the hospital property. The new hospital supply main has been connected to this main at this point and constructed as far as the location for the underground concrete water reservoir. A booster pumping station with suitable domestic supply pumps and a fire pump will be constructed at the water reservoir. About 15 per cent of the outside services have been completed.

The Department of Highways district headquarters buildings at Bancroft were served, since their construction several years ago, by three large septic tanks, each with a disposal bed. This method of sewage disposal has always been unsatisfactory and troublesome because of local soil conditions. Early this year, it was decided that the new Department of Lands and Forests district headquarters would be constructed adjacent and west of the Department of Highways buildings on Highway No. 28 on the west side of the town. It was decided to construct a 10-inch sanitary sewer from the nearest point of connection to the Town of Bancroft sewer system at the corner of Chemaushgon and Station Streets, adjacent to Highway No. 28, thence westerly along the highway to the Department of Highways buildings, a distance of

3,200 feet. This construction was completed in January, the various buildings connected and the septic tanks demolished and filled in. Next year this sewer will also be available to serve the Department of Lands and Forests headquarters when it is completed.

Last year the Department of Lands and Forests district headquarters at Gogama was provided with a complete waterworks system. This year, the construction of a sanitary sewerage system to serve all the buildings and residences was begun in July, 1964, completed and placed in full operation in February, 1965. This project involved the installation of 4,400 lineal feet of sewers with manholes; the construction of a sewage lift station with 950 lineal feet of force main, and the installation of a prefabricated, extended aeration-type sewage treatment plant with a capacity of 12,000 gallons per day. The plant effluent is chlorinated and discharged into Lake Minisenakwa through a 700-foot-long ductile iron outfall sewer.

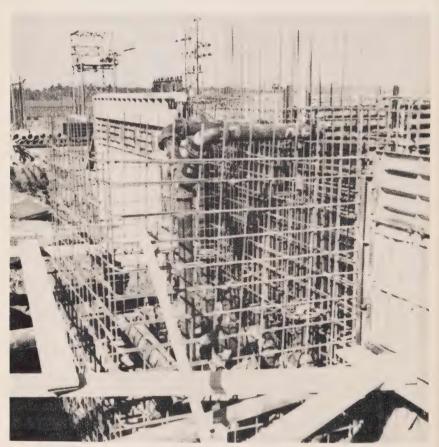
The existing irrigation system at the Provincial Forest Station at Orono became inadequate to meet additional water requirements for the rearing of seedling trees. To provide for the expanded requirements, a network of four, six and eight-inch asbestos-cement watermains, totalling 6,000 feet in length, was installed. Special type outlets for connecting the underground spray system were incorporated. This system will also supply domestic water to several buildings and fire protection by means of new standard fire hydrants. The system was completed in December.

A new Chief Ranger's Headquarters, comprising four buildings, was built during the year at Red Rock Lake on Highway No. 17, 22 miles south of Wawa. The water supply system provided was designed to serve a maximum population of 100 persons with their domestic requirements, and to provide adequate fire protection to the buildings. The system consists of a 10-inch gravity intake carried out into Red Rock Lake, a distance of 200 feet and terminating in the concrete wet well below the pumphouse. Three electrically driven domestic water service pumping units and a 500 U.S. gallon per minute gasoline engine driven fire pump are located in the pumphouse. These pumps provide chlorinated water through the system of mains to the buildings. A suitable number of fire hydrants are located on the watermains. The waterworks was completed and placed in operation last December.

At the Department of Public Works stores buildings, Mimico, a second water service six-inch in size, was installed into the property from the Horner Avenue watermain, and a concrete meter chamber provided with a water meter. Within the building area, an additional 1,375 lineal feet of water main was constructed and two additional fire hydrants installed. This main was connected to the existing four-inch supply main from Judson Street. Fire

protection requirements now meet the standards of the Fire Marshal's office and in case of a ruptured main at any location, all the buildings can be fed from either service.

Since 1930 until recently, the source of water supply for the Main Camp and Town site, Industrial Farm, Burwash, has been from the Wanapitei River about three miles distant. The river water has never been very satisfactory and in recent years has become more contaminated. A search for an adequate source of ground water was carried out by test drilling which proved highly successful. As a result, we now have twin deep wells about 15 feet apart, each capable of producing 250 gallons per minute. However both cannot be pumped simultaneously. The construction of the new waterworks was commenced early last July and was completed and put into full operation last month.



Construction of water reservoir and pumphouse building, Burwash Industrial Farm

This consisted of: a brick pumphouse, housing the twin deep wells and pumps; a six-inch water supply main from this pumphouse, a distance of 4,500 feet to new underground reinforced concrete; a two-compartment water reservoir, having a capacity of 225,000 gallons. The reservoir and also the new booster pumping station, which is a separate entity, are located adjacent to the powerhouse. Water is drawn from the reservoir by high-lift pumps in the pumphouse, is chlorinated and delivered to the existing water distribution system for domestic use. A diesel engine driven fire service pumping unit has also been installed in the pumphouse to provide the required fire flow at the various hydrants. The original waterworks plant at the river and the long supply main will be maintained on a stand-by basis until it has been proven that the water supply from the deep wells is a reliable, year-round source of supply.

A new sanitary sewerage system was provided at the Industrial Farm, Fort William, and placed in operation last fall before freeze-up. The system was designed to serve a maximum of 180 people. This works involved the installation of 2,000 lineal feet of sewers with necessary manholes, a sewage comminutor and on the east side of Highway No. 61 the construction of a sewage lagoon of 1.8 acres. At the same time all the outside services were extended as required to provide for the proposed dormitory building.

Due to increased production of the license plate plant at the Ontario Reformatory, Millbrook, it was necessary to enlarge the existing disposal system handling industrial wastes. This was effected by the construction of a half-acre lagoon. Also at this institution, the installation of a six-inch sanitary sewer 700 feet in length was carried out to convey the domestic wastes from the administration offices to the trunk sewer leading to the sanitary sewage treatment plant. This permitted the elimination of septic tank and disposal field formerly utilized.

In order to provide storm water drainage for the front portion of the property at the Boys' Training School, Simcoe, which could not be drained into the main system of existing drains, a storm sewer was installed on the township road allowance. This 18-inch diameter sewer which is 2,000 lineal feet in length, was constructed on the west side of the township road and was carried southerly to the first east-west side road, thence diagonally across the road to discharge into a large open ditch. An adequate number of catch-basins were provided as required and the work was completed in the Spring of 1964. No further flooding has since been experienced in this location. The work was carried out in co-operation with the Township of Woodhouse.

In addition to the above described construction works, 16 small and

medium-sized construction items were carried out for the various departments during the fiscal year.

During the year, at various locations throughout the Province, 35 deep wells were drilled, developed and brought into production. Thirty-one of these wells were of medium capacity, i.e., with a production of from five to 20 Imperial gallons per minute.

At the University of Guelph one domestic water supply well was completed which has a capacity of 400 Imperial gallons per minute. A second well of 100 Imperial gallons per minute capacity and a well for irrigation having a capacity of 90 Imperial gallons per minute were also completed. In addition to these larger wells, a well was completed at the Southern Research Station. Maple, having a capacity of 425 Imperial gallons per minute. This well is adjacent to and a twin to the existing large capacity water well. In the case of each of the medium capacity wells, a suitable automatic pressure system was supplied and installed. In the case of the large wells, a suitable turbinetype deep well pump was installed in the irrigation well at the University of Guelph. A pumphouse will be constructed in the early summer to house the pump to be purchased and installed in the larger domestic water supply well. At the Maple well, the construction of the pumphouse and the installation of the turbine pump was recently completed. In addition to the above mentioned drilling, two existing wells were repaired and test drilling was carried out at the Industrial Farm, Burwash (Camp Bison) but no water source was located.

A complete site survey was carried out from which detailed site plan drawings were prepared showing all buildings, roads, walks, fences, manholes, fire hydrants, etc., together with all underground services at the Ontario Reformatory, Burtch; the Department of Lands and Forests Air Base, Sault Ste. Marie; and the University of Guelph farmlands, showing contours. In addition, a re-survey was made at University of Guelph of the building area, the Ontario Reformatory, Guelph, and the Ontario School for the Deaf, Belleville.

Respectfully submitted,

H. E. Bushlen, P.Eng.,

Chief of the Sanitary Engineering Division.

HE Bushlew.







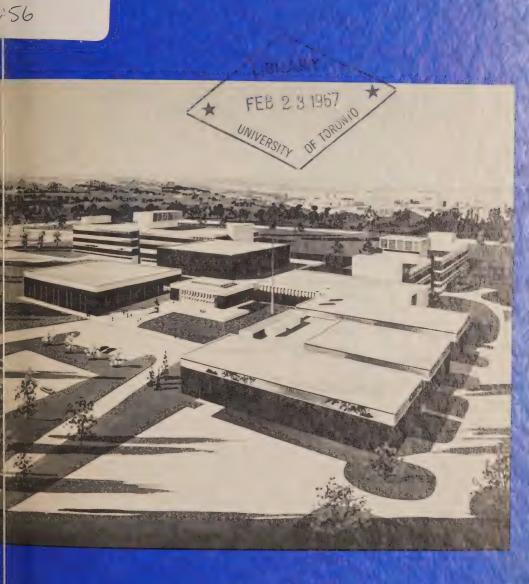
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# PARTMENT OF PUBLIC VORKS ANNUAL REPORT



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# Report of the Minister of Public Works

**Province of Ontario** 

For the Year Ending March 31, 1966



Printed by order of the Legislative Assembly of Ontario

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THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE WILLIAM EARL ROWE, P.C.(C)

Lieutenant-Governor of the Province of Ontario.

#### YOUR HONOUR:

I submit for the information of your Honour, and the Legislative Assembly, the Annual Report of the works under control of the Public Works Department, comprising the report of the Deputy Minister, for the 12 months ending the 31st of March, 1966.

Ay Connell

MINISTER OF PUBLIC WORKS

Department of Public Works, Toronto, March 31, 1966.



THE HONOURABLE RAY CONNELL, Minister of Public Works, Parliament Buildings, Toronto, Ontario.

SIR:

I have the honour to submit to you the accompanying reports of the Chiefs of the Architects, Real Estate, Accounts, Personnel, Purchasing, Services and Legal Branches and the Civil Engineering and Sanitary Engineering Divisions for the fiscal year, April 1, 1965 to March 31, 1966.

In presenting these reports, I desire to take the opportunity to extend my thanks and appreciation to you for your co-operation when dealing with all matters pertaining to the administration of this Department.

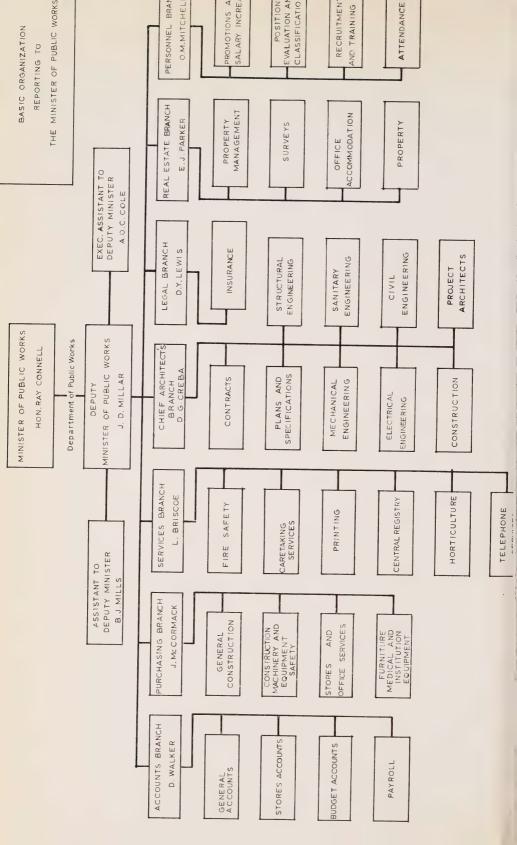
May I also thank the members of the staff of the Department of Public Works for their assistance in carrying out our greatly expanded construction program during the past year.

I have the honour to be, Sir,

Your obedient servant,

DEPUTY MINISTER OF PUBLIC WORKS.

Toronto, March 31, 1966.



### Report of the CHIEF OF THE ARCHITECTS' BRANCH

MR. J. D. MILLAR,

Deputy Minister of Public Works,

Parliament Buildings,

Toronto, Ontario.

#### DEAR SIR:

I have the honour to report on the work accomplished by the Architects' Branch of the Ontario Department of Public Works for the fiscal year April 1, 1965 to March 31, 1966.

Our building program has amounted to almost \$260 million in capital commitments for projects that are either under construction or some phase of planning. Of this sum, \$130,902,245 is under construction, \$43,980,075 approved for construction, and \$10,499,400 for property purchases. It also includes \$74,427,000 for items which have been approved for planning.

This progressive, extensive and intensive schedule of work for the various departments of government resulted in the completion of many large works notably for the Departments of Agriculture, Attorney General, Education, Health, Highways, Lands and Forests, Reform Institutions and Treasury. Paramount, of course, was the launching of the Queen's Park Office Extension in Toronto.

For Health, a new mental hospital was established at Palmerston with work well under way on a new psychiatric hospital at Porcupine in northeastern Ontario; hospital expansion progresses at the Ontario Hospitals in London and Penetanguishene while in Metro Toronto, the Ontario Psychiatric Institute and the Central Health Laboratory are nearing completion.

Education gained a new Ontario Vocational Centre at Sault Ste. Marie and a new boys' dormitory at the Brantford Ontario School for the Blind while substantial advancement was made on two large projects — a new College of Education at London and second-stage construction of the new Ontario School for the Deaf at Milton.

Agriculture benefitted with the official opening of two large agricultural plants at the University of Guelph. These were the Chemistry and Microbiology building and the Poultry Pathology, Wild Life Diseases and Virus Research Institute.

Four new district headquarters' buildings were built for the Ontario Pro-



Queen's Park project looking northeast



Queen's Park project looking southwest



Queen's Park project looking southeast

vincial Police at Downsview, Peterborough, Mount Forest and South Porcupine as well as a new registry office building at Haileybury.

For Highways, the regional and district office building at Kingston and a new district office building at Fort William were substantially completed. Lands and Forests acquired a chief ranger's office at Bancroft, a new dormitory building for Dorset Forest Ranger School, a hatchery building for Normandale and an office and laboratory for Wheatley. These projects are dealt with in more detail in the following report:

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

After years of planning and detail the Queen's Park Office Extension project was launched at a sod turning ceremony on January 7, 1965, by Prime Minister John Robarts and Public Works Minister Ray Connell. Excavation started on January 11 and first concrete was poured on March 23.

Since that time the first phase of the project has advanced rapidly. Exterior stone and granite work on the Hepburn Block is nearing completion. More than 60,000 cubic feet of Queenston limestone and over 4,000 cubic feet of polished black Canadian granite have been used to face the new building

which will provide about 150,000 square feet of air-conditioned office space.

Structural steel work is about 35 per cent done on the 14-storey Ferguson Block, which faces Wellesley Street adjacent to the Whitney Block, and construction is progressing on the square, two-storey central core Macdonald Block. These structures and the 11-storey Hepburn Block compose the \$28,337,000 first-phase contract awarded to Perini (Western) Ltd., Toronto, in December, 1964.

A later phase will include the nine-storey Hearst Block to be erected at the corner of Wellesley and Bay Streets, and the 24-storey Mowat Block to be built at the corner of Bay and Grosvenor Streets. Last year's Report contained a full description of the entire project.

The Hepburn Block is expected to be substantially completed early in 1967. Detailed facts and figures on its construction are as follows:

Excavation 42,000 cu. yds.; concrete 13,150 cu. yds.; weeping tile 1,200 lin. ft.; stainless steel 3,000 tons; stone 60,320 cu. ft.; granite 4,220 cu. ft.;



Southern view of Frost Building showing rear



Southern view of Frost Building showing front

steel deck 11,000 sq. ft.; aluminum windows 1,400 units; glass 67,200 sq. ft. ¼ inch plate; elevators 7; stair flights 54; acoustic ceilings 180,000 sq. ft.; valves 3,000; steel pipe 20,000 ft.; cast iron 10,000 ft.; copper pipe 40,000 ft.; ductwork (a) spiral 10,000 ft. and (b) rectangular 500,000 lbs.; induction units 600; wire and cable 250,000 ft.; conduit 100,000 lin. ft.; lighting fixtures 6,000; trench duct over 5,000 lin. ft.

The other major project in the Queen's Park area is the Treasury (Frost) Building extension which has been under construction since April 1964 and is now essentially completed. Mathers and Haldenby, Toronto architects, were associated on the project which was contracted to Redfern Construction Ltd., for \$4,162,000.

Alterations, improvements and general renovation work is a continuing factor in all government buildings in the Metropolitan Toronto area. The

largest renovation program ever undertaken at the old Parliament Buildings since its first occupancy in 1893 was carried forward from the previous year and is still continuing. It was moving time for personnel of the Provincial Secretary's Department during the latter part of April and the first of May 1965 when they moved from their long established quarters in the South Wing to the North Wing. An official opening ceremony was held on May 26, 1965.

Renovations and alterations to bring the Legislative Library facilities up to modern standards have been brought to near completion. The work has included ventilation, supply and exhaust, new ceilings, partitions, lighting and structural changes.

The major move by the Provincial Secretary's Department has left free a large area of the South Wing for purely legislative purposes and considerable work has been done to further this purpose. It has included renovation and furnishing of rooms 191, 193, 194 and 195 for the Speaker, Deputy Speaker and Sergeant-at-Arms; renovations to offices on the first floor for the Minister of Labour; renovations in room 349 for the New Democratic Party; renovations in rooms 111, 112 and 113 to provide new offices for the Opposition; complete structural changes, painting and renovations to form a Members' lounge on the east side of the Legislative Chambers and renovations to rooms 102 to 110 for the Clerk of the Legislative Assembly. Alterations and renovations to 30 rooms on the third and fourth floors were also completed for the Attorney General's Department; the TV-Press Conference room was finished and alterations which included structural work, painting, refinishing, flooring, lighting and general repairs were made to the Members' lobby vestibule, Whip's Office and Press Gallery.

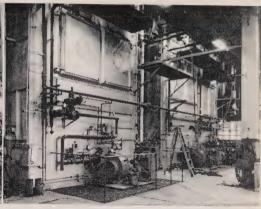
The marble slabs, upon which are inscribed the names of previous members of the Legislature and which were formerly mounted on the walls of the hall leading to the Legislative Library, were removed, remounted and reengraved on the south wall facing the elevators and post office on the ground floor. A new steel flagpole was erected at the front of the building, on the west side, to match the existing flagpole. The flag raising ceremony was held May 21, 1965.

On Thursday, January 27, 1966, Prime Minister John Robarts unveiled the Whitney Plaque in the Legislature and officially renamed the "East Block" the Whitney Block. The plaque has been placed on the north wall of the Queen's Park Crescent entrance. Considerable work has been done in this building. Of great interest was the essential completion of extensive alterations to the boiler room to increase steam generation for servicing not only the existing buildings in the Queen's Park area but those of the Queen's Park Office Extension project, plus the Banting Institute, St. Joseph's College School and the old Toronto Psychiatric Hospital.

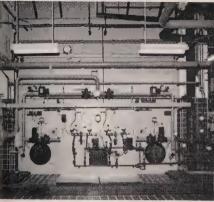
### BOILER ROOM CONVERSION IN THE WHITNEY BLOCK



**Demolition three boilers** 



Original three watertube boilers



Existing 50,000 pph boiler



Master control panel



**Pump Room** 



Standby diesel electric generator

To handle the heating requirements of the additional office area, two new package-type, watertube gas-oil-fired boilers, of 80,000 pph capacity, have been installed in the existing boiler room. They replace three old 12,000 pph units which have been dismantled. One eight-year old, standard integral-type boiler with a 50,000 pph capacity has been retained for service. With the new installations the total steam generating capacity of the powerhouse has been raised from 75,000 to 210,000 pph. This improved combustion efficiency from the gas-oil fired units has meant not only increased steam output and lowered maintenance costs, but has also enabled the government to conform with local smoke abatement by-laws.

Primary fuel is natural gas with oil as the stand-by fuel. The gas is supplied on an interruptable basis. When the outside air temperature drops below 10F, and private demand for gas reaches a peak, an automatic control cuts off the gas supply and maintenance engineers switch the boilers over to oil. The fuel used is No. 4 which requires little preparation and burns cleanly. It has a low sulphur content, gives a high combustion factor, and it doesn't need pre-heating.

The oil is delivered to the storage tanks at 80F, and filtered and pumped to the burners at 70F. There is a tank capacity for one week's supply.

Routine maintenance, alteration and renovation work was carried out, as necessary, in all other Metropolitan Toronto government office locations.

### For The DEPARTMENT OF AGRICULTURE

Two significant events occurred at the University of Guelph in 1965. These took the form of a take-over and official opening of two large building projects — the Chemistry and Microbiology building at the Agricultural College and the Poultry Pathology, Wild Life Diseases and Virus Research Institute at the Veterinary College — by the University. The cost to build, equip and furnish these two large agricultural establishments to date amounts to \$6,086,883.39.

The Chemistry and Microbiology building was officially opened on Saturday, June 26, 1965, at a plaque unveiling ceremony at which the Hon. William A. Stewart, Minister of Agriculture, and the Hon. Ray Connell, Minister of Public Works, officiated.

The Chemistry and Microbiology building has meant an outlay of \$4,282,724.13 to build, equip and furnish. The building has a total floor area of about 120,000 square feet and has the same general design as the Biology and Soils buildings built by this department a few years ago.

Its form is "U" shaped, adopted to limit frontage and to permit future ady expansion. The general accommodation provides lecture rooms, pecial purpose rooms, many teaching and research laboratories, multiurpose rooms, offices, a 300-seat lecture theatre centrally located on the rst floor, a library on the ground floor under the lecture theatre, several maller lecture theatres, and space for service and storage.

The Department of Chemistry occupies the east side and wing with an ea of some 65,000 square feet, while the Department of Microbiology, in e west side and wing has a slightly smaller area. Dunker Construction Ltd., Kitchener, were the general contractors and William R. Souter & Associates e associate architects.

Official opening of the Poultry Pathology, Wild Life Diseases and Virus esearch Institute took place on August 31, 1965, when a commemorative aque was unveiled by the Hon. Ray Connell, Minister of Public Works, ld the Hon. William A. Stewart, Minister of Agriculture.

The investment in this building for construction, equipment and furnishings nounts to \$1,804,159.26. It was built by Ball Bros. Ltd., Kitchener conactors, who received the contract for its erection in May 1963. There were bidders tendering for this job.

The new institute has facilities to provide a diagnostic service to poultry d fur ranchers, facilities for virus research in birds, animals and fish, along the epidemiology, plus extensive facilities for the training and supervision graduate students. It brings together three groups formerly housed inequately in various parts of the Ontario Veterinary College.

The significance of these two buildings lies in the fact that they are the lst of the major construction projects to be undertaken by the Department Public Works on the University of Guelph site except for various items renovation and alteration work, etc., previously provided for in comtements and still to be completed.

Because of this, it might be of interest at this time to give a brief history the colleges. The growth has been phenomenal especially in the past years. In recent years we have seen the Ontario Agricultural College, to Ontario Veterinary College and Maconald Institute become the Feduted Colleges of Guelph and eventually receive university status in May 164. September 1, 1964 — the day after the official opening of the Virus Issearch Institute — was another big day in its gradual take-over as a diversity.

The long history of achievement in agricultural research and education, wich has contributed so enormously to the agricultural operations of the povince, began back in 1869.

Sir John Carling held the dual portfolio of Commissioner of Public West and Agriculture at that time in the Macdonald Ministry. (They called Cabe Ministers Commissioners in those days — a title which only went outsusage in 1914).

It was in the year 1869 that Sir John made the first proposal to establish School of Agriculture for the Province. Four years later, the Ontario Government purchased for this purpose a 500-acre farm near Guelph from Will restore, a prominent livestock importer and breeder. The property include a good equipment of farm out-buildings and a substantial and commodist farmhouse called Moreton Lodge.

In 1874, the Ontario School of Agriculture was opened with More n Lodge as the first school building and 28 students enrolled. The Ontaga Agricultural College developed from the Ontario School of Agriculture in 1882.

The Ontario Veterinary College, established in Toronto in 1862, 18 moved to the campus at Guelph in 1922. In 1903, Macdonald Instite was founded for training in domestic science.

The three colleges occupy approximately 40 buildings on a 1,500-ae campus and have an enrolment of about 1,700. Over the past decade e undergraduate student body has doubled. The College was affiliated where the University of Toronto for the granting of degrees in Agriculture, and 1888 the first degrees were conferred.

Between 1890 and 1902, the Gymnasium, Horticulture, Dairy, Fid Husbandry, Biology building, and Massey Hall and Library were erect. Then in 1903 and 1904 came the Macdonald Institute and Macdonald Hubbuildings. Classes in Home Economics were established, bringing worn students to the campus for the first time. This was an event of special iportance since it immediately changed the social atmosphere of the collegion.

Soon after the close of the First World War, a campaign was started) raise funds for the construction of a suitable war memorial. As a rest, War Memorial Hall was begun in 1923 and completed the following ye. It was officially opened and dedicated at the semi-centennial celebration June 1924.

In the years 1928 to 1947 more farmland was bought and there was mit building activity. This included a fine new Administration building al Students' residence; an additional residence for women students (Watst Hall); and a new Horticultural building with extensive greenhouses. In modern central heating plant was also built to take the place of the adequate old heating system.



Exterior of new dormitory addition, Kemptville Agricultural School



Lecture room, Kemptville Agricultural School

Then, in 1939, came the Second World War. Many of the college buildings, with much of the campus, were turned over to the air force for the duration. At this time the work of the college was retarded, but its doors were never closed.

At the close of the war, and with the return of the buildings for college use, there was the heavy task of rehabilitation. The post-war problems were many. All departments of government were clamouring for expansion and in private industry the same condition existed. A great building gap had to be bridged and it was some years before the construction industry got into full stride.

Many, many millions of dollars have been poured into the building expansion on this campus. The acceleration has been particularly marked during the last 10 years. Since 1952-53, construction costs have approximated \$22 million. Of this amount, over \$18½ million represents the costs of new works since 1957-58.

Many fine structures have sprung up since that time such as the Gymnasium and Physical Education building, the Medical-Surgical building, the Soils building, the Biology building, the new Piggery, the new Laundry, the main generating and switchgear building to service the whole campus, the disease-free animal holding unit, the experimental pathogen-free pig unit, the Breeders Service building and many other smaller works.

Work on the addition to the girls' dormitory at Kemptville Agricultural School, started in February, 1965, was completed in September 1965. The cost for this project was \$193,959.61 at the close of the fiscal year.

The new extension is of masonry construction with steel joists and approximates 94 feet six inches by 41 feet four inches. It has a basement and two floors. The first and second floors contain 20 bedrooms with accommodation for two girls in each bedroom. The basement has a large lecture and assembly room, kitchenette, laundry room and areas for linen and trunk storage. The contractors were John Entwhistle Construction Ltd. of Cornwall.

# For The DEPARTMENT OF THE ATTORNEY GENERAL ONTARIO PROVINCIAL POLICE BUILDINGS

For many years the Department of Public Works has maintained close liaison with the Attorney General's Department in providing buildings and facilities for the Law Enforcement Branch of the Ontario Provincial Police. Ontario is divided into 17 police districts which are serviced by district headquarters buildings located in principal cities or towns. Districts, in turn, are broken down into areas policed by detachments, each of which is made up of a number of officers required for law enforcement in the area. There are 235 detachments in the province.

Long term plans for expansion were augmented during the past year with the acquisition of four new district headquarters buildings, at Downsview, Mount Forest, Peterborough and South Porcupine, near Timmins. Costs for these buildings totalled \$1,181,142.86 at the end of March 1966.

In the past few years new district headquarters buildings have been established at Burlington, Niagara Falls, Barrie, Belleville, Long Sault near

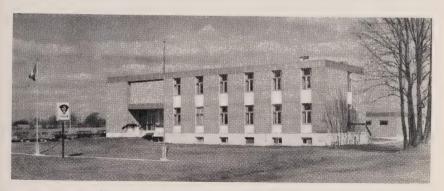
Cornwall, and Port Arthur. Approaching tender call are two district headquarters buildings for London and Sault Ste. Marie.

Downsview — This new district headquarters has cost \$368,082.10 to build, equip and furnish. Work on the project began early last year. It was completed and occupied on March 25, 1966.



New district headquarters' building, Downsview

The building has been located on the southwest corner of Highway 401 and Keele Street, in close proximity to the Department of Transport's driver examination building. David Farm Construction Ltd., Toronto contractors, were the builders. The building approximates 134 by 35 feet and consists of a basement, first and second floors. Construction was of steel frame and concrete block, with external face brick, built-up flat roof, aluminum facia, flashings and window frames. There is an eight-car garage on the site.



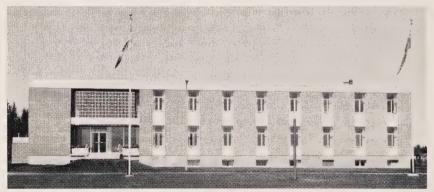
New district headquarters' building, Mount Forest

MOUNT FOREST — This project, begun in November 1964, was occupied on December 15, 1965. It has cost \$266,691.70 to build, equip and furnish to date. It is similar to the Downsview job although not quite so large having an area of 100 by 35 feet. A three-bay garage is located at the rear. Parking for 28 cars has been provided. The two-storey and basement building has been erected on Highway No. 6, about one mile from the centre of the town. It was built by Paul Carruthers Ltd., Thornhill contractors.



New district headquarters' building, Peterborough

PETERBOROUGH — Police moved into their new headquarters building at Peterborough on December 13, 1965. Some outside work remained to be done, weather permitting. This project was contracted to M. J. Finn Construction Ltd., of Peterborough, late in October 1964 and work began in December. Construction had reached 27 per cent at the close of the previous fiscal year. In size and accommodation it is similar to Mount Forest. It stands on the Peterborough by-pass facing Highway 7. At the end of the fiscal year, the project had cost \$307,611.48 to build, equip and furnish.



New district headquarters' building, South Porcupine

SOUTH PORCUPINE — Construction of this district headquarters building stood at 11 per cent at the end of March, 1965. By March 1966, the job was essentially finished. Contracted to M. Sullivan & Son Ltd. of Arnprior in October 1964 for \$268,319, expenditures at the close of the fiscal year totalled \$238,757.58. Workmen are cleaning up deficiencies and landscaping has not yet started. The design and construction is similar to those at Mount Forest and Peterborough. The building has been erected at the corner of Highway 101 and Legion Drive, east of Timmins.

A full description of these district headquarters' buildings was given in the previous year's Report.



New O.P.P. detachment building, Napanee

NAPANEE — Except for minor details the detachment building under construction at this site was completed the previous year. All work was finished during the summer of 1965.

#### **COURTHOUSES AND REGISTRY OFFICES**

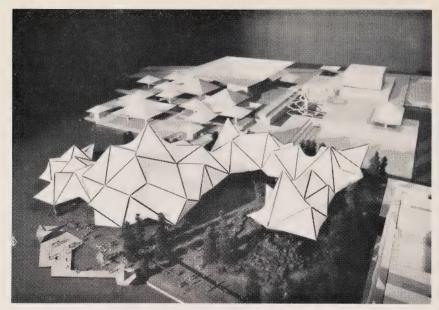
Tenders for a new Registry Office building at Haileybury were called in March 1965. Low tenderer was Farquhar Construction Ltd., of North Bay, whose \$175,300 bid was the lowest of six submissions by general contracting firms for the job.

The building was completed and taken over by the Department of the Attorney General on Tuesday, March 22, 1966. There were a few items of grading and landscaping to be finished when weather permitted.

The building, 90 by 45 feet, has been erected beside the existing courthouse. It comprises a basement and first floor and is of steel construction with brick facing. The large general office and public area are on the first floor as well as offices for the registrar and deputy registrar, photo copy and drafting rooms and space for office storage.

The basement has staff and public washrooms and areas for bookbinding, storage and record storage. The boilers will heat both the new building and the existing courthouse.

Nearing tender call was a project for an addition to the Muskoka district courthouse at Bracebridge including renovations to the existing courthouse.



Artist's conception of the Ontario Pavilion, Expo '67, Montreal

### For The DEPARTMENT OF ECONOMICS AND DEVELOPMENT

Ontario will be distinctively represented at Expo '67, the Montreal World's Fair, with an exciting pavilion which will tell the story of Canada's banner province.

The pavilion, 115 feet high and covering more than two-and-a-half acres, will be made of plastic, steel, wood and glass. The area will be landscaped with 60-foot trees and tons of granite.

The attractive structure was shown as a model in the Main Parliament Buildings. It is hoped it will act as a shining lure for visitors when the exhibition opens in 1967 for Canada's Centennial Year. By design of Toronto architects Fairfield & Dubois, the unique structure is being located on the south side of the Ile Notre Dame at the Centennial site in the St. Lawrence River. Its bold sweeping lines will present a pleasant contrast to the neighbouring buildings.

Stewart and Morrison Ltd., Toronto industrial designers, are developing more than 50 separate exhibits to give visitors a graphic picture of Ontario—past, present and future. The individual exhibits will form a honeycomb of

colour and motion beneath a canopy of fibreglass and steel, providing an exciting visual story of Ontario's progress.

The building will cover about 50,000 square feet of the 90,000 total land area of the Ontario exhibit. Its curved and twisting shape will be draped with a vinyl-fibreglass roof over a light steel frame.

The structure will be elevated some 18 feet off the ground and Expo's tiny monorail system will pass right under it.

A walk through the building will lead the visitor past the exhibits, which will begin with a child's "world of wonders" and end with "ideas for new found leisure". A series of exhibits will explain the importance of industry, business, agriculture, natural resources and human ingenuity in making Ontario Canada's most wealthy province.

Finally, the trail leads to the focal point of the pavilion, a large 100-foot high circular theatre, accommodating 350 people every 10 minutes. The pavilion will have four restaurants ranging from a formal dining room to a barbecue, all looking out over the water. Facilities will accommodate all age groups, with a "park your tot" service for mothers.

A \$203,500 contract was awarded to Cook & Leitch Ltd., of Montreal, in November 1965 for piling and foundation work. Construction of the building is being done as a joint venture by Perini Quebec Inc. and Cook & Leitch, Ltd., of Montreal, who received a contract for general trades construction in late February for \$4,580,000.

## For The DEPARTMENT OF EDUCATION

No major contracts were awarded during the year for the Department of Education, but the program of works already under way on three large projects and one moderately sized project, was pushed forward. These were the College of Education at London, the Ontario Vocational Centre at Sault Ste. Marie, second-stage construction of the Ontario School for the Deaf at Milton and a new boys' dormitory at the Brantford Ontario School for the Blind. This work alone has entailed an expenditure of \$11,283,236.57 for construction, equipment and furnishings.

The Ontario Vocational Centre at Sault Ste. Marie was 80 per cent completed at the end of the previous fiscal year. Good progress was made during the summer and the building was essentially completed in August 1965 with only minor work to be done. Department of Education personnel occupied the buildings during this month with students enrolling in September. At the end of March 1966 the major part of the equipment had been received.



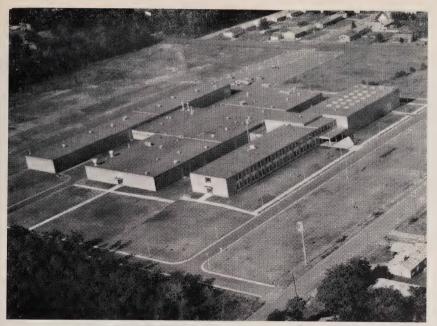
Front, showing main entrance, College of Education, London



Gymnasium-Auditorium area, College of Education, London



Library, Dining Rooms and Shops area, showing sports field,
College of Education, London



Aerial view, Sault Ste. Marie Vocational Centre

The total complex has a floor area of 160,000 square feet. Costs for the structure, furnishings and equipment reached \$3,578,451.32 at the end of March 1966. It was built by the Foundation Co. of Canada Ltd. (Sudbury Unit) and consists of three distinct but interconnected main buildings located at Northern and Willow Avenues.

Ellis-Don Ltd. of London were contracted to build the new College of Education at London on April 8, 1964. Construction began in the month of the award and the work was advanced to the half-way mark at the end of the previous fiscal year. Today, the project stands at 85 per cent. The administration, auditorium, gymnasium, seminar, workshop and cafeteria wings are completed but work still has to be done on the academic wing. Concentration is now on finishing the interior of the building. About 50 per cent of landscaping has been done. Except for the library, the entire building is in use by the college.

The handsome structure stands at the intersection of Huron Street (Sarnia Gravel) and the Wharncliffe Road (Western Road) and was designed by the London architect, H. L. Hicks. Costs of construction, furniture and equipment to date totals \$3,527,935.86. The project was described in the previous year's Report.

### SOME INTERIOR VIEWS AT THE SAULT STE. MARIE VOCATIONAL CENTRE



Machine Shop

Machine Shop



**Drafting Room** 



**Welding Shop** 



Industrial Chemistry



Cafeteria



Aerial view, stages 1 and 2, Ontario School for the Deaf, Milton



Aerial view, stage 2, Ontario School for the Deaf, Milton

Second-stage construction of the new Ontario School for the Deaf at Milton has advanced to 84 per cent, and interior work is progressing. The project consists of a senior academic school, vocational school, senior boys' and senior girls' residences, and a double gymnasium with connecting swimming pool located on Highway 25, south of Milton. It was described

last year. The job was contracted to Frid Construction Co. of Hamilton who submitted the lowest of four bids. Costs for the job have reached \$3,744,723.28. When this stage is completed it will bring the school's accommodation to 540.



Precast canopies at rear of Academic Wing, Ontario School for the Deaf, Milton



Senior boys' residence and Vocational Wing of Senior School,
Ontario School for the Deaf, Milton

The senior boys' dormitory which has been under construction at the Ontario School for the Blind at Brantford was completed in May 1965. Brooks and Van Poorten, Brantford architects, were associated on the project which was built by Shultz Construction Ltd., also of Brantford. It has cost \$432,126.11 to build, furnish and equip. The project was described last year.

The structure has a basement and rises two storeys and is built into the sloping brow of the hill overlooking the Grand River Valley. The two dormitory floors have bedroom accommodation for 60 boys and six house parents.

An event of importance was the official opening of the Ontario Vocational Centre at Ottawa on May 3, 1965. This handsome educational plant was built under the Federal-Provincial Technical and Vocational training agreement at a cost to construct, furnish and equip of \$4,973,000. Officiating at the ceremonies were the Hon. William G. Davis, Minister of Education, who officially opened the building, the Hon. Allan J. MacEachen, Canada's Minister of Labour, and the Hon. Ray Connell, Minister of Public Works. The builders were V. K. Mason Construction Co., of Ottawa. The site is on Woodroffe Avenue, south of the Base Line Road.

Planning for the Hamilton Technical Centre advanced to the point where the project was nearing tender call. It will be built on a choice 66-acre site at the corner of Fennell Avenue and West Fifth Street, on Hamilton Mountain opposite the Ontario Hospital. A description follows:

The Hamilton Technical Centre combines two institutions — the Hamilton Institute of Technology and an Ontario Vocational Centre — together with common facilities which they share: auditorium, gymnasium, library, cafeterias, administrative offices and computer centre.

The building is set well back from the surrounding streets and has been designed to conform with the gently rolling site.

Because of the close inter-relationship between the two institutes, the architects decided early in their study that the whole complex should be under one roof. It was a requirement of the program that each institute retain its own identity, and that provision be made for future expansion.

The resulting layout resembles an incomplete pinwheel radiating about the main entrance and lobby. The gymnasium, auditorium and library are clustered around the main lobby to enclose and emphasize it. One arm of the pinwheel faces West Fifth Street and contains the Ontario Vocational Centre; the other arm faces north towards Fennell Avenue and is the Hamilton Institute of Technology. Future expansion will extend in a south-westerly direction from the main lobby. The Hamilton firms of McIntosh and Moeller and Gerrie and Butler are jointly associate architects for the project.

The anticipated student population will be 2,400-1,200 in each institute. The total floor area comprises 435,000 square feet. It will be fully air-conditioned to permit year-round teaching and the power plant is designed to permit enlargement to serve 100 per cent expansion.



Artist's conception of the Hamilton Technical Centre

Provision has been made for the installation of closed circuit television and educational television. There will be parking for 1,200 cars on lots separated by landscaped strips which will be out of sight of the streets. The project is designed so that handicapped persons may enter and use the building without assistance.

Each institute has its own student common rooms and 400-seat cafeteria (the cafeterias share a common kitchen). The cafeterias open onto a sunken landscaped court, which the common rooms overlook from the floor above. The court can be entered directly from the cafeterias or from the other wings of the complex to form an outdoor extension of the student facilities.

In addition to shops and laboratories, each institute is provided with teaching rooms of various sizes: seminar rooms, standard and double classrooms and lecture theatres. The double classrooms can be divided into two standard-sized classrooms by removable soundproof walls, so that teaching accommodation can be easily adjusted.

There are five lecture theatres — two for the Vocational Centre and three for the Institute of Technology. Each group of lecture theatres is placed in a location central to the institute it serves, and is arranged so that the theatres share common preparation-projection rooms. Each lecture theatre is equipped with a rear projection screen which permits the showing of slides or films while the room lights remain on for note taking.

In order to reduce walking distances and time lost between classes, a multistorey solution was developed. The main circulation level is at the first floor (one floor up from the lowest level). Corridors at this level are interior pedestrian streets linking all parts of the complex.

Service traffic and delivery of supplies are restricted to the ground floor corridors (the lowest level). Elevators are provided for service use only as the highest part of the complex, the Hamilton Institute of Technology laboratory block, consists of four storeys — two up and one down from the first floor circulation level.

This block is of reinforced concrete waffle-slab construction and contains classrooms, laboratories, seminar rooms and offices. Textile laboratories have controlled atmospheres which can be adjusted from 35 per cent to 65 per cent relative humidity.

The metrology laboratory will have controlled atmosphere "white room" purified air. This room can only be entered through an "air shower" vestibule which subjects the occupant to a strong blast of air designed to remove all dust particles from the clothing. Within this laboratory is an even more finely controlled Standards Room. This is a prefabricated unit in which the most severe standards of air purity and temperature control will be maintained. The air temperature will not vary more than one-tenth of a degree and the air will be 99.97 per cent free of dust particles down to a size 0.3 microns.

The Unit Operations laboratory will be a room where industrial chemical processes are studied. It will be a two-storey work area permitting the assembly of complex apparatus up to 26 feet high.

The other controlled atmosphere rooms are the Textile Testing laboratory and the Electrical Standards room. Both of these rooms maintain constant temperature and humidity in order that testing and measurement may be carried out in accordance with recognized standards.

The radio-active room will be underground. It will have thick concrete walls and roof and an elaborate system of interlocked warning and safety controls and will be used for X-ray and gamma radiography and a neutron generator.

In order to save floor and wall space, the rooms in the laboratory block will be heated and cooled by a suspended metal radiant ceiling. This system combines a radiant heating and acoustic surface and results in a considerable saving in total floor area.

The Shop block of the Vocational Centre is of precast prestressed concrete construction with clear spans of up to 54 feet, and is three storeys high. Large exhaust ducts take fumes from such shops as welding and foundry to the ends of the wing and up shafts to exhaust high above the ground.

The fully equipped foundry laboratory will teach modern foundry processes and will be 'the cleanest shop in the building'.

The ground floor corridor leading to the cafeteria has been designed as a miniature shopping mall, with show windows for retail store training and sewing shops on one side, barbering and hairdressing shops on the other.

Motor Vehicle Repair is a separate wing in steel construction with its own classrooms and locker and shower facilities. There are three large clear span shops for auto body repair, motor vehicle repair and diesel repair. These shops have high windows around the top of the walls, above the roof level of adjacent smaller rooms.

This wing also contains the central power plant. Off the power plant is an underground room containing the main electrical switchgear and transformers. The underground hydro service enters directly into this room and from it feeders lead out to other substations of the complex.

There are many common facilities. The auditorium seats 700 on the orchestra floor level and 350 in the gallery for a total of 1,050.

The proscenium opening is 40 feet wide by 18 feet high. The stage is 24 feet deep with a 13-foot frontage in front of the proscenium. The stage has wide wings and is fully equipped with an overhead grid for hoisting scenery. A complete stage lighting system is controlled by a main panel in the projection room with secondary control possible from the stage. The forestage can be removed to create an orchestra pit. Under the stage are dressing rooms and a workshop for construction scenery.

The auditorium is designed for functions ranging from lectures and graduation ceremonies — which take place on the forestage area in front of the proscenium curtain — to musicals with full orchestra and complex sets of lighting. Box office and cloakroom facilities are also included.

The gymnasium floor accommodates one college-sized basketball court plus folding bleachers. Total bleacher accommodation on main floor level and galleries level is 1,500. With bleachers folded up, the main floor area can be set up with six badminton or four volleyball courts. All bleachers fold up to free floors for other uses. Galleries will be used for such activities as wrestling, judo, fencing, weight lifting and archery.

The central office area contains general offices, placement and counselling centre, health office, computor centre, offices for the principals of the two institutes with connected conference rooms, and staff common rooms.

#### For The

#### DEPARTMENT OF HEALTH

Five major projects for the Department of Health were carried forward from the previous year, representing a general trades contract value of \$22,148,767.73. They were the first-stage reconstruction at the Ontario Hospital at London; the second-stage of the new hospital at Palmerston; the Northeastern Psychiatric hospital at Porcupine and, in Toronto, the Ontario Psychiatric Institute and the Central Health Laboratory. One large contract was awarded for new buildings at the Ontario Hospital, Penetanguishene. Two smaller contracts were awarded for a regional health laboratory at Palmerston and a trades building at Port Arthur. These awards brought the total contract value of work to \$23,616,934.73.

The new hospital at Palmerston was taken over in February 1965 but considerable work remained from the standpoint of furniture, furnishings and equipment installations. This was carried through during the year.

The Palmerston hospital has been renamed the Midwestern Regional Children's Centre. The official opening was held on Wednesday, January 19, 1966, when a large crowd was in attendance to join the dignitaries in the unveiling of a commemorative plaque by the Hon. John Robarts, Prime Minister of Ontario, assisted by the Hon. Matthew B. Dymond, Minister of Health, and the Hon. Ray Connell, Minister of Public Works.

The Centre has only 240 beds and has been kept intentionally small so that it may become better integrated into the community. It will service seven counties — Bruce, Grey, Dufferin, Wellington, Waterloo, Huron and Perth — and will admit as patients retarded children from this area between the ages of six and 16 who are ambulatory.

A smaller project at this site was a regional health laboratory that had been in the planning stages last year. Tenders closed on April 14, 1965, for this job which went to G. & J. Wintjes, of West Hill, for \$44,630. The laboratory was structurally finished and ready for occupancy in February 1966 and about 65 per cent of the equipment was ready for installation.

This new building was erected immediately south of the existing power-house and trades building. It is a single storey structure with no basement, 50 by 37 feet in dimensions. Construction was of block with brick facing, wood joist built-up roof and aluminum windows. Heating is supplied from existing boilers. A sanitary bacteriological laboratory with adjoining stock-rooms comprise the main accommodation.

In Toronto, the Pigott Construction Co., general contractors for the Ontario Psychiatric Institute, had reached the 63 per cent mark at the close



The Clarke Institute of Psychiatry, Toronto



Small lecture room, Clarke Institute of Psychiatry, Toronto

of the last fiscal year. The work has advanced to structural completion, supplies were being received and preparations were under way to hold the official opening ceremonies some time in May 1966. It has been renamed the Clarke Institute of Psychiatry and has cost \$7,751,934.83 to build, equip and furnish. The job consists of a 14-storey tower and connected three-storey research wing located at College and Huron Streets on the west campus of the University of Toronto.



Animal operating room in Research building showing ceiling operating light installation,
Clarke Institute of Psychiatry, Toronto



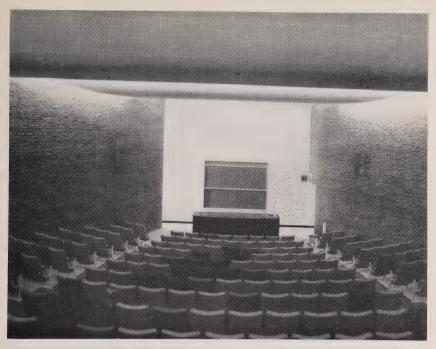
One of many research laboratories, Clarke Institute of Psychiatry, Toronto



Northwest view, Central Health Laboratory, Toronto



Main entrance, Central Health Laboratory, Toronto



Auditorium, Central Health Laboratory, Toronto

The Central Health Laboratory project stood at 76 per cent at the close of the previous fiscal year. The laboratory is now completed and ready for occupation.

Wilson and Newton, Toronto architects, designed the building which comprises a laboratory and auditorium wing joined by a section containing the main entrance. The floor area is about 174,600 square feet. McNamara Construction of Ontario Ltd., Toronto, were the contractors. Costs to build, equip and furnish amounted to \$5,050,655.18 at the end of the fiscal year.

The Northeastern Psychiatric Hospital at Porcupine progressed from 10 per cent as of March 31, 1965 to 55 per cent in March 1966. It was contracted to McNamara Construction of Ontario Ltd., Toronto, for \$4,342,000 in October 1964. The design of the building follows the pattern of those built in the last few years at Owen Sound, Goderich and Palmerston. The complex cottage-type buildings overlook Lake Porcupine, near Timmins, and will accommodate 300 patients when completed. This project was described in the previous Report.



Aerial view, Northeastern Psychiatric Hospital, Porcupine

The other big job was first-phase reconstruction at the Ontario Hospital, London. Ellis-Don Ltd., London contractors, were engaged for the job at a contract price of \$2,808,177.72. The project progressed from 10 to 72 per cent in the fiscal year period. Interior work is advancing with "A" Wing painted out and floor tile installed. This wing is finished off and ready to turn over to the out-patient health clinic.

Imminent approval for the multi-million second-stage reconstruction at this hospital was expected at the turn of the fiscal year. Tenders had been called in February to close March 17, 1966.

The project involves north and south pavilions, each consisting of a central core with four wings to each core. All are two-storey with basement. The centre core has the addition of a mechanical penthouse. The pavilions will have an approximate bed accommodation of 528 which, coupled with the bed accommodation in the first-stage buildings, will provide a total bed accommodation of about 600.

There will be four uses for the wings: admission floors, convalescent floors, geriatric floors and intermediate floors. Foundations, structural frame and floor and roof construction will be of reinforced concrete. The exterior

involves reinforced concrete for the circular cores and face brick to the wings. Windows will be generally glazed aluminum sash; entrances extruded aluminum; and the roof two-inch insulated tar felt and gravel.

Basements will, primarily, be used for storage facilities with provision made for future finishing in some areas. Partitions for the interiors will be concrete block; floor finishes-resilient tile and terrazzo; wall finishes — plaster with cereamic tile to washrooms and work areas; finish ceilings — acoustical radiant metal; interior door frames — pressed steel with wood and hollow metal flush doors.



Perspective of Stages 1 and 2, Ontario Hospital, London. Centre core comprises first stage. Star-shaped wings are second stage

Tenders were called early in March 1965 for two additional buildings at the Penetanguishene Ontario Hospital. Tenders closed April 14. Seven firms bid for the job which went to the low tenderer Dunker Construction Ltd., of Kitchener, at \$1,281,555. A full description was given in the previous Report. Basically, the project consists of two identical buildings — one housing 100 female patients and the other 100 male patients. They constitute the first-stage of an expansion program planned for this hospital which will eventually increase the accommodation by 400 beds. At the end of the fiscal year, the first-phase project had reached 60 per cent completion.

To mark another forward step in the expansion program at this hospital, tenders were called in March for a new powerhouse. The building will be about 117 feet by 46 feet and will replace the obsolete structure already on the hospital grounds. It will be centrally located to serve the whole hospital including the section at Oakridge where the Criminally Insane buildings are located.

The combined trades, garage and implement shed storage building for the Port Arthur Ontario Hospital, which was reported last year as being 75 per cent complete, was finished in July. This building was contracted to Michieli Bros., Fort William contractors, and has cost \$174,958.84 to date to build and equip.



New construction at Ontario Hospital, Penetanguishene

Extensive alterations and renovations to buildings at the newly acquired R.C.A.F. Station at Edgar progressed during the year. At the end of the fiscal year \$161,983.44 had been spent on this work. It will serve as an annex to the Ontario Hospital at Orillia and will be used for the care of retarded children who are more or less ambulatory cases.

Tenders were called in February 1966 — to close March 24, 1966 — for a Day Care Centre for the Ontario Hospital at Thistletown. The new facility will have two clinical teams who will assess children with a view to admission and handle as many cases as possible on an outpatients' basis. Part of the purpose of the Centre will be to find out how many patients it is possible to treat while they are living at home.

Planning was well advanced for a new headquarters building for the Alcoholism and Drug Addiction Research Foundation in Toronto. General maintenance and renovation work was carried forward at the many Ontario Hospitals throughout the province.

# For The DEPARTMENT OF HIGHWAYS

Two general trades contracts totalling \$1,376,200 were completed for the Department of Highways. The major job was a regional district and office building at Kingston for \$939,700; the other was a \$436,500 district repair garage at Fort William. Both contracts were awarded in October 1964.

John Shore Construction Ltd., Ottawa, were the general contractors for the Kingston project which is a L-shaped building 243 feet by 91 feet at the main core with an 83 by 60 foot addition at the rear. It comprises a basement, first and second floors and mechanical penthouse. It is located on Counter Street, near the 401 Highway. In March 1965 the work was about 8 per cent done. It was essentially completed in March 1966.

The new district repair garage for Fort William was built by Stead-Lindstrom Ltd., of Fort William, on a block of land bounded by Mountain Avenue and Isabella, Walsh and James Streets. Overall dimensions are 255 by 92 feet, one storey. The building was conditionally accepted on January 26, 1966, from the general contractor and turned over to the Department of Highways. Touch-up landscaping will be done in the Spring.

Two new contracts were awarded. They were for a Bailey Bridge and Steel Fabricating building in the Toronto Metropolitan Area and a paint and carpentry shop for Kenora.

A \$232,100. general trades contract went to Lynch-Richards Construction Co., of Weston, to build the Bailey Bridge and Steel Fabricating building at Sheppard Avenue and Highway 400. The site is on existing Department of Highways property. It will be a concrete block building with prestressed



South elevation, district repair garage, Fort William

roof and deck and contain facilities for repairs to Bailey Bridge sections and the fabrication of reinforcing steel. The building will contain shops for steel bending, finishing and sand blasting as well as a storage area, boiler room, washroom, lunchroom and two offices.

At the close of the fiscal year a general trades contract was awarded the Kenora contractors, E. R. Norman Ltd., to build a paint and carpentry shop at Kenora for \$67,325. The building will be located near the divisional equipment garage on existing Department of Highways property. About 80 by 50 feet in size, it will be constructed of insulated metal fabrication on block foundations.

# For The DEPARTMENT OF LANDS AND FORESTS

Four projects were in the works for the Department of Lands and Forests last year with a total contract value of \$615,610.61 and planning for a district office building at Cochrane was nearing the tender call stage.

The chief ranger's headquarters building at Bancroft, tendered in September 1964 and contracted to Markus & Son Ltd., of Pembroke, for \$89,352 in November 1964, stood at 40 per cent at the end of March 1965. It was finished in August 1965. The building is located in the Township of Farady, Hastings County, on Highway 28 about one mile west of Bancroft. The



New dormitory, Ontario Forest Ranger School, Dorset

structure is one storey and about 93 feet by 43 feet. A description was given in the previous Report.

The new dormitory at the Dorset Forest Ranger School — a three-level project — was essentially finished in March 1965, but minor work was carried forward until June when the project was completed. It was erected by the Arnprior firm of M. Sullivan & Sons Ltd., at a contract price of \$279,188. With equipment and furnishings the cost has amounted to \$395,562.10.



Office and Laboratory, Fisheries Research Station, Wheatley

A \$144,732.09 general trades contract went to Kehl Construction Co. Ltd., of Harrow in January 1965, for expansion of facilities of the Department of Lands and Forests fisheries research station at Wheatley, located just south of Wheatley in Mersea Township.



New hatchery building, Normandale

On April 5, 1965, the general contractor began stripping the topsoil from the site. At the end of March 1966, exterior masonry walls and partitions were completed; the tar and gravel roof, together with the necessary flashings, of the office and laboratory section and the roof and asphalt shingles of the

maintenance building were done; plastering, painting, resilient floors and electrical, plumbing and heating were finished. Laboratory equipment remained to be installed along with exterior grading. Lands and Forests personnel were expected to move into their new quarters in May.

Construction of the new fish hatchery building at Normandale Fish Hatchery had reached an advanced stage at the close of the last fiscal year. It was completed and in full operation at the close of this fiscal year. The contract was for \$102,338.52. Construction was done by Gilvesy Construction Ltd., of Tillsonburg.

A \$194,500 general trades contract was awarded during the latter part of October 1965 to Ray St. Amour Construction Ltd., of Timmins, to build a District Office building for the Department of Lands and Forests at Cochrane. This was the lowest of the tenders submitted by four firms on August 19, 1965.

The new building will be located on Fourth Avenue, adjacent to Third Avenue, in Cochrane. It will consist of a semi-basement and first floor and of masonry and steel construction. There will be a grass area at the front and concrete at sides and the rear. A 19-car parking lot will be at the rear.

The first floor will have public and general offices, a research unit, forest protection office and wildlife office. The semi-basement will house a drafting room, meeting rooms, laboratory, timber offices, mechanical room and lunchroom. Ontario timber products will be used wherever possible throughout the building particularly in the entrance hall and foyer.

Construction was under way in November and had reached 15 per cent completion at the end of March 1966. Concrete foundations, footings and walls are done; structural steel columns, main floor beams and joists are in place and installation of perimeter weeping tile in progress.

# For The DEPARTMENT OF REFORM INSTITUTIONS

Construction of the new abattoir at the Guelph Ontario Reformatory had reached the half way mark in March 1965. The building is substantially completed and most of the equipment has been installed. Len Ariss & Co. of Guelph were the general contractors for the 180 by 120 foot two-storeyed structure.

### For The

### DEPARTMENT OF TOURISM AND INFORMATION

Planning for the Centennial Centre of Science and Technology — the Province of Ontario's Centennial project — reached the stage where tenders were called to close February 23, 1966. Four major contractors bid for the job which resulted as follows:

Pigott Construction Co. LtdToronto	\$21,703,310.00
Inspiration LtdToronto	\$22,400,000.00
V. K. Mason Construction LtdToronto	\$23,724,000.00
Perini LtdToronto	\$23,853,000.00

It was expected the contract would be awarded in April.

The Centre will consist of three main buildings. On the upper level, accessible from Don Mills Road, will be an entrance building containing reception facilities for both the public and the visiting school children, and a public restaurant and children's cafeteria.

On the high land, connected to the Entrance building by a three-level covered bridge, will be a Core building containing important educational facilities; an auditorium and lecture room; a major exhibition area for the orientation of visitors dealing with the relationship between man and his environment; and administrative offices.



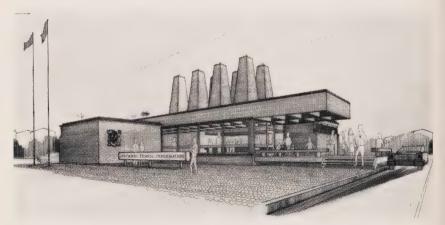
Artist's conception of Centennial Centre of Science and Technology,

Don Mills and Eglinton area, Toronto

Below the Core building on the valley floor will be three large exhibition areas reached by elevators and escalators. These will house science exhibits, a junior museum and technology exhibits. Adjacent to these areas will be service departments, research facilities and an area for the housing of study collections.

The Centre will be integrated with and offer services to the elementary and secondary school system of Ontario and the Province's institutions of higher learning. In addition, it will provide both educational and recreational facilities for the public at large as well as visitors from other provinces and countries.

The Centennial Centre was conceived by Raymond Moriyama, Vancouverborn architect, whose assignments include four town-planning studies for the City of Toronto. The design is striking in conception showing a central structure of triangular shape with castle-like bastions at the corners linked by covered walkway and covered stairway to its outlying buildings. The site is a dramatic one at the edge of the Don Valley ravine, just west of Don Mills Road and just south of Eglinton Avenue at the geographical hub of Metro Toronto. It is handy to the MacDonald-Cartier Freeway (Highway 401), thus increasing its accessibility to residents of the province beyond the borders of Metro Toronto.



Proposed tourist reception centre, Sault Ste. Marie

Nearing tender call was a new tourist reception centre for Sault Ste. Marie. The concept for this building is an entirely new departure from the tourist reception centres of the past.

Toronto architects McBain, Lee, Robb, Elkin and Jung have designed this proposed new Centre with a distinctive silhouette. The building will have long entrance decks and overhead canopies of laminated timber to welcome the visitor and lead to a central reception hall. At the same time through the extensive use of natural materials a warm and vital atmosphere will be created within.

A modular reception counter with six reception stations will flank one side of the interior while the other side will have visitors' washrooms. Maps and posters will be mounted on the wall. The whole area will be washed in natural light from the skylit roof lanterns overhead.

Behind the reception counter will be racks for the display of travel literature, served from a storage area behind. A supervisor's office, staff facilities, service and utility rooms complete the facilities. Materials have been chosen for their character and warmth, their utility and economy. Natural and stained wood finishes predominate. Ceilings will be white acoustic tile and floors a beige vinyl tile.

The building, which will be located on Huron Street, near the point where U.S.A. visitors enter Ontario via the bridge and ferry, will be fully insulated and glazed with insulating glass. Heating will be electric and a mechanical exhaust system will provide ventilation.

The bureau will be zoned in plan and any part is easily expandable as the need arises. Ample parking for cars and trailers will be provided on the landscaped site.

Tourist reception centres for Homer, near St. Catharines, and Windsor are planned.

### Report of the

### CHIEF OF THE CIVIL ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31, 1966

MR. J. D. MILLAR,
Deputy Minister,
Department of Public Works.

The work performed under the supervision of the Chief of the Civil Engineering Division during the fiscal year 1965-66 was as follows:

### 1. HYDRAULIC SECTION

### (A) DAMS, DOCKS, LOCKS, ETC.

### SUMMARY:

The investigation, pre-engineering, design, construction and inspection of the work on dams, docks, locks, etc., was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs were made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas.

Four concrete dams, one timber dam and one concrete dock, previously commenced, were completed. Three concrete dams and one timber dam were started and completed this year. Work on two concrete dams, one concrete wharf and one timber dock was started. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

### AGIMAK LAKE DAM, Ignace Township, Kenora District

A reinforced concrete dam was constructed at the outlet of Agimak Lake near Ignace, to maintain water level in the lake as required for the Department of Lands and Forests Air Base.

The new dam is 70 feet long. It has two 14-foot-wide sluiceways with timber stoplogs and an 18-inch sluice valve which provides a base flow during periods of low water. The head of water, measured from the sluiceway sill to the regulated water level, is four feet six inches and the overall height

of the dam is 12 feet. A steel sheet pile cut-off wall was installed under the concrete foundation of the dam, and steel sheet pile walls join the gated section of the dam with the earth filled wingwalls.

### CAMP LAKE DAM, Finlayson Township, Nipissing District

The existing dam at the outlet of Camp Lake in Algonquin Park was constructed with concrete by this Department in 1924. This year, the easterly wing of the dam was reconstructed with reinforced concrete. The new portion of the dam is 33 feet long and 12 feet high. It has a 30 inch square steel valve for regulation of the discharge flow. The remainder of the dam which was less deteriorated was left in place to serve as a crest overflow wall.

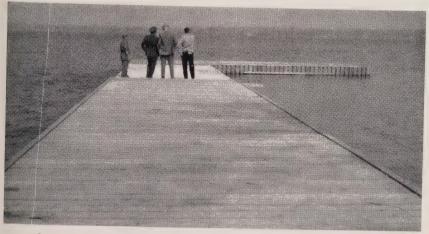
### CANOE LAKE WHARF, Peck Township, Nipissing District

The existing timber retaining wall and wharf at the Department of Lands and Forests Canoe Lake Station in Algonquin Park was found to be unstable and in need of reconstruction. A new wharf was designed in reinforced concrete.

Concrete work was carried out to completion in cold weather utilizing steam heat and a polyethylene enclosure.

The new wharf is 160 feet long and 10 feet high. The wharf has two slips for docking the Department of Lands and Forests watercraft.

The work on building an additional parking area, grading of the earth fills and landscaping will be carried out early next season.



Completed dock at Lake Couchiching, Ontario Athletic Leadership Camp, Longford Mills

# LAKE COUCHICHING DOCK at ONTARIO ATHLETIC LEADERSHIP CAMP Longford Mills, Rama Township, Ontario County

The permanent portion of the dock was constructed with concrete last fiscal year. This year, two floating sections, each 46 feet long and 14 feet wide, were constructed with timber and steel tanks and attached to the permanent dock.

### **DUNCAN LAKE DAM, Tyrrell Township, Timiskaming District**

The existing timber dam across the west branch of Montreal River at the outlet of Duncan Lake was constructed by lumbering interests many years ago. It had deteriorated beyond repair and was partially washed away by flood flow and ice. In 1964 the Department of Lands and Forests requested reconstruction of the dam.

The new dam was designed in reinforced concrete as a curved gravity dam of crest overflow type. This year, an access road was built to the site and a by-pass channel excavated. The construction work on the dam proper will be carried out next fiscal year.

### **DURHAM DAM, Glenelg Township, Durham County**

The concrete portion of the dam and part of the earth fills were completed last year. This year, the remaining work on the earthfills was carried out and the mechanism for automatic operation of the steel radial gate was installed. The project was completed on July 16, 1965.



New dam across Boyne River, Earl Rowe Provincial Park

# DAM and RESERVOIR AT EARL ROWE PROVINCIAL PARK Tosorontio, Simcoe County

The new dam, including a fishway, was completed last year, except for finishing of the north earthfill wingwall, which was left open for by-passing water around the dam.

This year, excavation work for deepening the river channel in the reservoir area, developing the beaches and islands and improving the banks of the reservoir was undertaken. Later, the north wingwall of the dam was filled in and the flow diverted through the sluiceways of the dam. About 75 per cent of the work on reservoir improvements was completed and the remainder will be carried out next year.

### FREELAND LAKE DAM, Killarney Township, Manitoulin District

The existing crest overflow timber dam at the outlet of Freeland Lake in Killarney Provincial Park was partially reconstructed upon request of the Department of Lands and Forests.

Timber sheeting was renewed along the front of the cribwork and the 32-foot-long discharge crest was covered with a new timber floor. An impervious earth carpet was placed along the front of the dam and in the upstream channel. The area downstream of the dam was covered with heavy rock rip-rap. The project was completed on September 25, 1965.

### FROOD LAKE DAM, Curtin Township, Sudbury District

Preparation of the construction site, bringing in of concrete aggregates and some work on rock excavation was done last year. This year, construction work was carried forward and the project completed on October 15, 1965.

The new dam has three 14-foot wide sluiceways, two 12-foot wide sluiceways and 34 feet of overflow wingwall. The head of water in the 14-foot sluiceways, measured from the sill to the regulated water level, is eight feet and in the 12-foot sluiceways it is 12 feet. The overall height of the dam is 19 feet. Each of the two groups of sluiceways has a separate deck. A 30-foot long wingwall connects the two sluiceway groups.

### GEORGE LAKE DAM, Killarney Township, Manitoulin District

The original dam at the outlet of George Lake in Killarney Provincial Park was built by lumbering interests many years ago. It had deteriorated beyond repair and was washed out by spring flow. In 1964, the Department of Lands and Forests requested reconstruction of the dam to maintain water level in the lake as required for the extensive recreational facilities now being developed in the Provincial Park.



The completed Frood Lake dam, Sudbury district



The completed crest overflow type dam, Lavieille Lake, Nipissing district

The new dam is of crest overflow type, constructed as a rock filled timber crib. The overall length of the structure is 105 feet and the length of the overflow crest 65 feet. Rock rip-rap was extensively used to protect the river bed downstream of the dam and to make the dam fade into the land-scape and appear only as a natural rapids in the stream. A 12-inch valve was incorporated in the dam to provide a base flow in the downstream area. The dam was completed on September 25, 1965.

### HUNTSVILLE DAM, Brunel Township, Muskoka District

The seven sluiceways of the dam were dewatered along the upstream side by using a portable floating cofferdam, constructed by this Department, and all deteriorated parts were renewed with concrete. Repairs to the discharge aprons and downstream portions of the piers were also carried out.

### KNOEPFLI (AHMIC LAKE) DAM, Croft Township, Parry Sound District

The upstream faces of the piers were dewatered by a portable cofferdam and replacement of loose stone and pointing of the masonry was done where required.

### LAVIEILLE LAKE DAM, White Township, Nipissing District

Building of the access road, clearing of the river channel and cutting of timber was done last year. This year the construction of the dam was carried out and the project completed on September 18, 1965.

The new dam is of crest overflow type, built as a rock filled timber crib. The length of the discharge crest is 300 feet, the structural height of the crib 11 feet and the width of the foundation 20 feet. Heavy rock rip-rap was extensively used to protect the river channel below the dam against erosion.

### MAGNETAWAN DAMS and LOCKS, Chapman Township, Parry Sound District

To improve the inflow of water to the dams, the narrows above the locks and dams were deepened and widened by excavation. Old cribs and loose rock were removed along the bottom and both sides of the channel for approximately 300 feet of its length.

### MARTEN RIVER DAM, Sisk Township, Nipissing District

The concrete portion of the dam was completed last year. This year, grading and landscaping was carried out. The project was completed on July 9, 1965.

# BOAT SLIP and BOAT HOUSE, Department of Lands and Forests Mitchell Bay, Dover Township, Kent County

The deteriorated boat slip was dewatered and excavated to the required depth; a timber frame was installed at the bottom of the slip to stabilize the sides against sliding in, and the side sheeting was renewed with four-inch by six-inch timber. Minor repairs were made to the boat house.

### MOUNT PLEASANT DAM, Brantford Township, Brant County

An old concrete dam, which maintained a water supply for the Department of Lands and Forests Public Fishing Development at Mount Pleasant, had deteriorated to the extent that reconstruction was necessary. Reconstruction was requested by the Department of Lands and Forests and work began November 23, 1965.

The new dam is a reinforced concrete structure with earth filled wingwalls. It contains one 14-foot wide sluiceway and a two-foot six inches wide gate chamber which houses a trash rack, screens and 12-inch diameter cast iron slide gate. The slide gate controls the supply of water to the public fishing ponds while the sluiceway serves to by-pass flood flows.

The dam is 80 feet long and 11 feet two-inches high from bottom of slab to top of deck. Grading and seeding of the surrounding area was carried out and the project completed on March 18, 1966.

### **OASTLER LAKE DAM, Foley Township, Parry Sound District**

The dam at the outlet of Oastler Lake was originally installed many years ago by a cottager to provide water power for a small electrical generator. The generating plant was later abandoned. However, the concrete dam was kept in repair by the government agencies not only to maintain the water level on the lake as needed for a Provincial Park but for the many cottagers around the lake. In 1964 the dam was found to be deteriorated beyond repair and the Department of Lands and Forests requested its reconstruction.

The new dam was constructed with reinforced concrete. It is 81 feet long and has one 14-foot wide sluiceway and an overflow wingwall with a 42-foot long discharge crest. The head of water measured from the sluiceway sill to the regulated water level is four feet and the overall height of the dam is 10 feet. The dam was completed on November 26, 1965.

### PORT SYDNEY DAM, Stephenson Township, Muskoka District

The seven sluiceways of the dam were dewatered along the upstream side by using a portable floating cofferdam, and renewal of concrete and pointing of masonry was done where required. Repairs to concrete and masonry along the downstream side of the dam were also carried out. The timber deck was renewed with three-inch timber planking.

# SOUTH BAYMOUTH DOCK, Tehkummah Township, Manitoulin District

The existing timber crib dock at the Department of Lands and Forests station at South Baymouth, Manitoulin Island, had deteriorated beyond repair. Construction of a new dock, which is based on timber piling, was started this year and the 270-foot long earth-filled approach embankment and 100 feet of the length of the timber dock were completed. Work on the remaining portion of the dock will be continued during the next fiscal year.



The completed dock at South Baymouth, Manitoulin district

### LAKE OF TWO RIVERS DAM, Canisbay Township, Nipissing District

The original timber dam on the Madawaska River near the outlet of the Lake of Two Rivers in Algonquin Park was installed by lumbering interests at the close of the last century. In 1949, the dam was reconstructed with timber by this department. In 1964, it was found to be deteriorated beyond repair and the Department of Lands and Forests requested reconstruction of the dam. This year it was reconstructed with reinforced concrete.

The new dam is 165 feet long. It has four 14-foot wide sluiceways. The head of water measured from the sluiceways sill to the regulated water level



The completed Lake of Two Rivers dam, Nipissing district

is four feet six inches and the overall height of the dam is 10 feet. The deck of the dam incorporates a one-lane roadway. The dam was put in operation on December 15, 1965. Final grading and landscaping of the river banks will be carried out early next season.

### **CURRENT REPAIRS AND MINOR CONSTRUCTION WORK:**

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the overhauling of stoplogs, winches and painting of steel parts of dams, locks and swing bridges, was carried out where necessary. Repairs were made to the following structures: Bala (North) Dam, Muskoka District; Baptiste Lake Dam, Hastings County; Margaret Lake Dam, Haliburton District; Mildmay (Weiller's) Dam, Bruce County; Nicholston Dam, Simcoe County; Ranger Lake Dam, Algoma District; Raven Lake Dam, Haliburton District; Lake Rosseau Boat Channel, Muskoka District; St. Ola Dam, Hastings County; Talon Lake Dam, Nipissing District; Trout Lake Dam, Algoma District; Westport Dam, Leeds County.

### **GENERAL:**

Minor repairs, adjusting of winches, painting of steel parts, replacing of stoplogs, etc., were made to 23 dams which are not listed above. Timber protection booms and safety cables were repaired, replaced or adjusted where required. Driftwood and beaver dams were removed from 29 dams.

### (B) WATER CONTROLS AND NAVIGATION AIDS

### WATER LEVELS:

Water levels in the Muskoka and Parry Sound Districts were successfully controlled by the Water Level Control Supervisor and his staff from our Huntsville Office. Although the 1965 Spring was unusually dry and the Fall was very wet, the water levels were maintained satisfactorily and no major complaints were received. The Bracebridge hydro-electric plant was supplied with sufficient water for maximum generation, except for a short period of two weeks in July. The H.E.P.C. generating stations were kept fully supplied for a maximum generation throughout the year. The spring drawdown was extended at the request of the Department of Lands and Forests to protect pickerel spawn in the Moon River; the winter drawdown was on schedule.

### NAVIGATION AIDS:

Two hundred and seventy-five drum buoys, 85 spar buoys and 25 warning sign floats were placed in Lakes Muskoka, Rosseau and Joseph, and connecting rivers and channels; 56 drum buoys and five spar buoys were located in the Huntsville area lakes, Muskoka River and connecting channels; 53 drum buoys were placed in Lake Cecebe, Ahmic Lake and Magnetawan River; all important channels were kept clear of floating and submerged logs, debris, etc., and safety booms and cables were placed and maintained in front of all dams; painting of dam railings, winches, stoplog opening frames and covers was carried out at all dams and locks as required; land-scaped dam and lock sites were maintained by pruning trees and bushes, cutting grass, etc; warning signs as well as other public regulating signs were placed at required locations.

During the winter months key construction personnel not employed on construction sites were used to good advantage cleaning and painting equipment and portable buildings. Public relations are excellent as no serious complaints were received during the year, and some commendations were received.

### (C) LOCKAGES

The records of watercraft which were passed through the three locks operated by this Department were as follows:

•		Boats over	Small		Total
		30 ft. in length	Boats	Scows	
Port Carling	Petroleonore	2,304	14,340	Nil	16,644
Huntsville		Nil	1,127	Nil	1,127
Magnetawan		Nil	475	Nil	475
		2,304	15,942	Nil	18,246

### 2. REMEDIAL WORKS

Grants were paid as follows:

Town of Collingwood, \$2,690.34; Township of Teck, \$8,576.94; Township of Ignace, \$5,877.43; Dominion of Canada, St. Joseph's Hospital, Chatham, \$32,322.89 to be completed next year.

### 3. MUNICIPAL DRAINAGE

Several applications for Municipal Drainage grants were investigated during the year, and one payment was made on a completed project; Township of Medonte, Simcoe County, \$1,068.80.

### 4. ROADS AND LANDSCAPING SECTIONS

### SUMMARY:

Several new roads and parking lots were constructed and existing roads and parking areas repaired throughout the various government establishments. Projects costing more than \$10,000.00 each are listed below:

### DEPARTMENT OF ATTORNEY GENERAL

AYLMER — The old R.C.A.F. Station was purchased for the use of a Police College and the existing roadways were resurfaced and ditches provided to facilitate the storm water drainage. This was the completion of work begun last year.

### DEPARTMENT OF EDUCATION

Longford Mills — Ontario Athletic Leadership Camp — Completed construction of the sports field, tennis courts and running track and provided new amenities for athletic curriculum such as badminton courts, etc.

### **DEPARTMENT OF HEALTH**

Gravenhurst — Ontario Hospital (Orillia Annex) — Completed reconstruction of entrance way and parking area, with adjacent sidewalk for pedestrians and others.

NEW TORONTO — Ontario Hospital — Provided new tennis courts for nurses and staff; reconstructed various roadways, including the extension of 18th Street.

### DEPARTMENT OF LANDS AND FORESTS

Dorset — Forest Rangers School — Reconstructed all roads on the campus including the provision of parking spaces for staff.

MCFARLANE LAKE — Chief Ranger's Headquarters — Completed asphalting of the exit, entrance and parking area, included in the general contract for the development of the headquarters building.

PETAWAWA — Fish Hatchery — The entrance road to the fish hatchery was asphalted, including drainage to prevent the damage and contamination of the fish ponds by visitors.

SAULT STE. MARIE — Air Base — Clearing of the bush was made to allow for the construction of a new taxi strip and aircraft pad. To be completed next year.

### DEPARTMENT OF REFORM INSTITUTIONS

MONTEITH — Industrial Farm — Reconstructed the main entrance and perimeter road around the Administration building, including the reconstruction of entrance way for delivery vehicles.

### **GENERAL:**

All specifications for roadwork involved in the preparation of projects prepared by Associate Architects were reviewed before finalization of contract documents. On projects prepared by this Department for general contracts, the specifications and drawings were checked with reference to roads, contouring, etc., and re-written or re-designed as found necessary. Many contracts under \$10,000. in value were prepared and executed for the various departments. Several roadwork contracts were pre-engineered, designed and contract documents prepared and submitted to the construction branch for execution.

Several landscaping projects were developed and contract documents prepared, but construction work was deferred until next year.

Respectfully submitted,

W. Z. Rice

W. L. Rice, P.Eng., Chief of the Civil Engineering Division.

### Report of the

### CHIEF OF THE SANITARY ENGINEERING DIVISION

Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

During the past fiscal year, all of the existing sanitary installations which consist of waterworks systems, sanitary and storm sewers, sewage treatment plants and pumping stations etc., at the various hospitals, schools and other institutions throughout the Province, were maintained in good operating condition.

At the University of Guelph, an eight-inch cast iron water supply main was installed, from the high capacity well adjacent to the Endinburgh Road, to the raw water reservoir on Power House Lane, a distance of 5,426 lineal feet. This well was completed and brought into production last year and construction of the deep well pumphouse started. The pumphouse construction has been completed and a deep well pump, with remote control from the powerhouse, provided, and the unit placed in operation. The eight-inch cast iron discharge main from the Stone Road deep well pump was connected to the new water supply main at the point where the one crossed the other. Both of these large wells are in the same water source and are not therefore utilized to supply water simultaneously. These wells are used singly in conjunction with the other existing wells and have a total potential of 525 Imperial gallons per minute continuously, which should be adequate to supply the University as it continues to expand for some years to come.

During the last 10 years, quite a considerable growth has taken place each year at both the Ontario Agricultural College and the Ontario Veterinary College and an even greater expansion is now planned annually for the next 15 years. The colleges were recently given university status and are now known as the University of Guelph. Prior to this, and due to the unusually rapid growth, it was known that the sanitary trunk sewer had reached its potential and before further expansion could take place, a new and much larger sewer would have to be designed and provided. Accordingly, the sewer was designed, tenders called and a contract awarded. The contractor began construction of the project early last December and has, to date, completed 65 per cent of the work. It is estimated that the completion date will be the last week in May.

The sewer starts near Highway No. 6 on College Lane and continues east on College Lane to Power House Lane. This section of the sewer is 18-inch diameter and 1,457 feet in length. At this point the sewer increases to 27-inch diameter, turns 90 degrees and runs north along Power House Lane to College Lane where it jogs westerly for a short distance, then turns northerly again to the limits of the University property, thence across the Cutten Fields Golf Course. The sewer then crosses the Eromosa River, which is not a very large stream, continues in its northerly direction and terminates in the 30-inch sanitary trunk sewer recently constructed by the City of Guelph.

The river crossing and the valley section of the sewer was accomplished by the use of an inverted syphon, constructed of 20-inch diameter steel pipe. 490 feet in length. The total length of the sewer will be 5,486 feet.

None of our elevated water tanks required cleaning and painting last year, but emergency repairs had to be carried out on three of them. Adequate outside services were provided to suit the respective requirements for all the new building projects as outlined in the Chief Architect's report.



Tunnel on College Lane for 27-inch gravity sewer showing steel tunnel liner,
University of Guelph



Beginning of 20-inch steel pipe inverted siphon, looking south from river,

University of Guelph

### CONSTRUCTION PROJECTS COMPLETED DURING THE YEAR

### Department of Agriculture

At the Vineland Horticultural Experimental Station, 1,200 lineal feet of six-inch cast iron pipe irrigation main was installed parallel with the existing section of six-inch irrigation main to increase the capacity of this section to the equivalent of an eight-inch pipe watermain. This was done to utilize the total capacity of the irrigation pump and also to enable water to be provided to some of the more distant farm areas located on the south side of the Queen Elizabeth Highway.

Contained in the same contract was the installation of a gravity drain to the storm sewer system from two separate electrical distribution system manholes which in the past had experienced periodic flooding. Farm drainage was installed at the Experimental Farm in four separate farm areas. Two of these areas were recently purchased to replace land acquired by the Department of Highways for the construction of the overpass and cloverleaf on the Queen Elizabeth Highway at Victoria Avenue. In the four separate farm areas, a total of 32,000 lineal feet of four-inch diameter farm tile and 360 feet of six-inch diameter header were installed.

### **Department of Attorney General**

The sanitary sewage disposal field was completely reconstructed at each of the following Ontario Provincial Police Detachments — Brockville, Cobourg and Hornepayne.

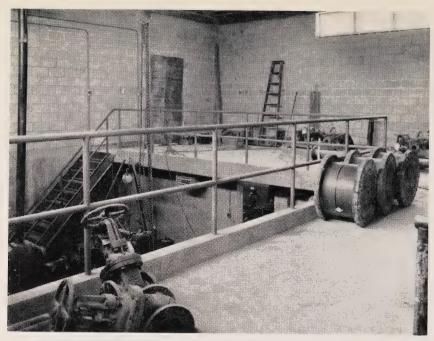
At the Ontario Fire College, Gravenhurst, the water supply source is Lake Muskoka and for some time difficulties were experienced as a result of suspended impurities in the water. To overcome this, diatomaceous earth filters were installed on the domestic water supply for the various buildings and several of the water lines were revised as necessary.

The domestic water supply at the Ontario Provincial Police Detachment, Kapuskasing, is from a deep well which was drilled prior to the construction of the detachment. This water was found to have a high iron content which resulted in staining of the porcelain plumbing fixtures. To overcome this, iron removal equipment was installed in the basement of the building.

At the Ontario Provincial Police Detachment, Sombra, the hypochlornator was originally installed on the aeration chamber of the sewage disposal plant. The function of this equipment is to chlorinate the plant effluent. This hypochlorinator was relocated in the detachment basement and provided with a timer. The work involved the installation of 100 feet of halfinch plastic tubing from the hypochlorinator to the chlorination chamber. The change was made to provide easy access and facilitate control. The cavitette aeration unit equipment was checked, some worn bearings replaced and the equipment re-installed and adjusted. This work was necessary to maintain optimum plant efficiency.

### **Department of Health**

During the year, the City of Brockville completed the construction of a new modern sewage treatment plant on the parcel of Ontario Hospital land on the south side of Highway No. 2. This plant was designed to have adequate capacity to receive and treat the hospital domestic wastes. An agreement between the City of Brockville and this department was finalized to provide for this, and a capital grant on proportionate basis paid the city. The hospital domestic sewage was turned into the new plant on November 4, 1965.



Waterworks pumphouse housing low and high lift pumps and two water softening units, Ontario Hospital, London

Complete reconstruction of the Ontario Hospital, London, is in progress and will be carried out in two stages. In view of this, it was necessary to plan in advance the entire rehabilitation of the hospital waterworks to meet the new requirements and at the same time provide for the softening of all the water, together with adequate storage for raw and softened water, and a new booster pumping station to permit the abandonment of the existing pumping equipment, located in the old vacated powerhouse. This construction is 70 per cent completed. It is anticipated it will be totally complete and operating early in June.

This construction includes the booster pumping station with underground reinforced concrete raw water reservoir of 50,000 gallon capacity, two large softening units, low lift pumps which deliver raw water through the softeners and thence to the existing 250,000 gallon reservoir. High lift pumps with suctions in this reservoir deliver the softened, chlorinated water to the revised system of distribution mains. A diesel engine driven 1,000 gallon per minute fire pump will be installed for fire protection. The water supply to the new raw water reservoir will be from the two existing city supply mains and the existing deep well located on the hospital property. This system will permit

the elimination of the elevated steel water tank which will be dismantled during stage two of the construction program.

At the Ontario Hospital, Orillia, the main water supply is from a large spring fed pond which has been in use since the establishment of the hospital. Last fall, a contract was let and the pond cleaned and deepened to provide a water depth of five feet, six-inches. This pond, which is half an acre in size, contains, since the deepening, 850,000 gallons of water which provides an excellent storage in the event of fire.

At the Ontario Hospital, Owen Sound, the gravel entrance road which is an extension of 8th Street East, was reconstructed and paved. In carrying out this work, the grades were improved which involved cutting and filling in various locations. In view of this, the eight-inch water supply main and the six-inch cast iron sanitary sewage force main had to be re-laid from the Owen Sound city limits to the hospital entrance road. This work was finished last summer and was carried out without interruption to service.

At the sewage treatment plant serving Ontario Hospital, Penetanguishene, it was observed that at periods of heavy rainfall, a much larger than normal flow was experienced, entering the plant. As a result of this an investigation of the sewers was carried out which revealed that an area of approximately one acre of pavement and roof surface was contributing storm water into the sanitary sewers, often causing a complete loss of activated sludge in the plant. To overcome this, a new storm sewer system was constructed consisting of three catchbasins, five manholes and 880 lineal feet of sewer. Since this storm water has been removed from the sanitary sewers, the treatment plant has consistently produced a good effluent.

At the North Eastern Psychiatric Hospital, Porcupine, the installation of the watermains within the hospital grounds has been completed and the connection made to the Township of Whitney supply main. The storm sewers are 70 per cent completed and the sanitary sewers 60 per cent. During the coming summer the sewers, waterworks, reservoirs, booster pumping station and sewage lagoon will be constructed and it is expected these services will be in operation by October.

At the Ontario Hospital, Port Arthur, flooding has been experienced at the northwest corner of the main building. The cause of this flooding was two-fold. First, our existing storm drain terminated at this point; secondly, this was a focal point for drainage from the cultivated fields to the west. Only an open ditch for which there is no proper outlet existed to remove this water. To solve the problem, a 10-inch storm sewer, 250 feet in length, was constructed from a new manhole provided at the end of the existing drain and carried into the existing 15-inch hospital trunk storm sewer. Two other manholes and two catchbasins were also provided to collect the run-off

from the fields and the paved roadway. At the same time, the drain on the paved parking lot of the main building, which had previously collapsed, was reconstructed and a new catchbasin provided. The depressed area in the parking lot, which resulted from the collapsed sewer, was then restored.

At the Ontario Hospital, Whitby, the storm water drainage system in the northeast area which includes the powerhouse, laundry building and kitchen No. 1 has been reconstructed. This was necessary since these sewers were very old, full of tree roots and inadequate in capacity. The manholes located on these sewers were combined storm and sanitary manholes. Consequently, frequent overflowing of sanitary sewage into the storm sewers was experienced which sometimes caused clogging of the storm water pumps. Intercepting catchbasins were also constructed in the old steam tunnels to prevent further flooding in the powerhouse.

At the Ontario Hospital, Woodstock, (Epileptic Section), a trunk storm sewer was constructed to serve the hospital's main wards, laundry and parking lots. This sewer was constructed to replace the old, inadequate existing storm drain which ran parallel with the sanitary sewer and shared combined manholes with this sewer in the building area. This section of the old storm sewer was eliminated, together with the combined manholes. Additional drainage was also provided to existing electrical manholes and steam distribution manholes. The new storm sewer terminates at the creek into which it discharges west of the building area.

An agreement was entered into between the city of Woodstock Public Utility Commission and this department covering the installation of an eight-inch cast iron water supply main to the Ontario Hospital at Woodstock to replace the present 65-year-old supply main. The route of the main is along the east side of Highway No. 59 beginning at Devonshire Avenue where connection was made to the city watermain. The main proceeds north along the highway, a distance of 2,400 lineal feet, crossing the Canadian National Railway, the Canadian Pacific Railway and the Thames River. This section of the main is being constructed using 12-inch diameter pipe in order to meet the city's future requirement in this area; the City Public Utility Commission is paying for the extra cost over and above that of the installation cost of the eight-inch size pipe. From the end of the 12-inch pipe at Perry's Lane, the watermain — which is to be installed in eight-inch size will cross the highway and terminate in the existing hospital meter chamber about 685 feet westerly from this point. The main is being constructed in accordance with the new Highway 59 alignment, new railway bridge and other construction now in progress. The installation of the water supply main, which was not started until the first week in March, is 50 per cent complete.

### Department of Highways

At the Mattawa Patrol Garage, an oil interceptor and leeching pit with perforated drain lines, were installed to overcome a drainage problem.

At the North Bay Material Yard, the only existing structure is an office building, serviced by a septic tank and disposal field, which constantly proved troublesome. We were able to eliminate this sewage disposal system which was aggravated by an increase in Highway personnel, since the Township of Widdifield recently extended their sanitary sewer along Highway 11. This was accomplished by the installation of a sanitary sewer 270 feet in length, connected to the Township sewer. The Highway crossing was carried out by boring and the provision of 50 feet of spirally welded 18-inch diameter steel liner through which the sewer was routed. The sewer was designed to accommodate additional new buildings to be built this summer.

### **Department of Lands and Forests**

An agreement between the Oshawa Public Utilities Commission and this Department was duly completed covering the installation of a water supply main at Darlington Provincial Park and supply of water, in the total amount of 13,500,000 gallons per summer season, with a peak flow of 300 Imperial gallons per minute. The main was constructed westerly along the north side of Wentworth Street East, commencing at Farewell Street where a connection was made to the existing city watermain. From the end of Wentworth Street East, which terminates at the Canadian National Railway main line, the watermain was routed along the Ghost Road which continues in a south-easterly direction paralleling the Canadian National Railway to the west entrance of the park. The watermain was terminated just inside the park where a concrete meter chamber was constructed. The installation of the necessary water lines within the park to supply the various comfort stations, buildings, camping areas, etc., will be carried out under a separate contract during the coming summer.

At Sibbald Point Provincial Park, located on the south shore of Lake Simcoe, the program of eliminating septic tanks with individual disposal fields, serving various units separately throughout the park, and diverting the domestic wastes to the existing sewage lagoon, was continued. During this year, gravity sewers were laid which picked up the sanitary sewage from two comfort stations and a concession building and discharged it into the existing sewage lift station which delivers the wastes to the sewage lagoon. In addition, comfort station No. 9 was reserviced by providing a new sewage lift station. This work will continue next year according to requests from the Department of Lands and Forests.



Dredge installing eight-inch water supply main, Wheatley Provincial Park

The first major construction was completed this year in the program of development of Wheatley Provincial Park on Lake Erie. This involved the installation of 12,000 lineal feet of eight-inch asbestos cement pipe to convey water from the Wheatley Public Utilities Commission pumphouse to the west end of the park. An underground concrete meter chamber was constructed at the end of the supply main so that all water consumed in the park can be metered and paid for accordingly. The water is then distributed by a system of mains and services to the various comfort stations, buildings, camping sites, etc. The system was designed to serve the needs of a maximum of 25,000 visitors to the park per day.

### **Department of Reform Institutions**

At the request of the Ontario Water Resources Commission, a sewage flow meter with totalizer was installed in the chlorinator house of the sewage treatment plant at the Boys' Training School at Bowmanville. This meter will provide the plant operator with an accurate measurement of the wastes treated and will enable him to operate with improved results.

At the Boys' Training School, Hagersville, which was originally a Royal Canadian Air Force Station, the existing sewage treatment plant was very carefully examined in detail and rehabilitated as was found necessary prior to occupancy. Owing to the much smaller population to be served than the plans were designed for, we were able to cut off one of the bio filter units.

The source of water supply for this school is Lake Erie which is about nine miles distant. The air force provided an intake into the lake to convey the water supply into a concrete wet well on the shore, together with a booster pumping station. The water is pumped from this point through the long pipeline to the school with one intermediate booster pumping station. Prior to the occupancy of the school, this Department was approached by the village of Jarvis with regard to their securing a water supply from this system since they were aware that adequate capacity was available. As a result, a satisfactory agreement was formulated to cover this and duly executed. Under the agreement, the waterworks will be owned, operated and maintained by the village of Jarvis and the school will pay for water consumed according to meter readings.

At the Kenora District Jail a six-foot high chain link fence was installed around the sewage treatment plant.

At the Ontario Reformatory, Mimico, 1,500 lineal feet of six-inch cast iron watermain was installed to complete a loop around the four dormitories, powerhouse, administration building and workshops. A second water service was provided to the powerhouse and a connection provided for the proposed recreation building. The completion of this watermain loop represents an important improvement in the system both for domestic water supply and fire fighting capability.

During the year, 38 new deep wells were drilled and brought into production at various locations throughout the Province. One existing well was repaired and its production restored. The new wells drilled were all of a capacity between four and 25 Imperial gallons per minite and in each case a suitable automatic pressure system was supplied and installed. The majority of these wells were drilled to provide a water supply for various Department of Lands and Forests Provincial Parks, seven wells being completed in Algonquin Park. Test drilling for a domestic water supply was also carried out at the Balsam Creek Fish Hatchery, Sibbald Point Provincial Park and Department of Highways at Kenora; the latter being unsuccessful.

A complete site survey was carried out from which detailed site plan drawings were prepared, showing all buildings, roads, walks, fences, manholes, catchbasins, fire hydrants and valves, together with all the underground services such as watermains, sanitary sewers, storm sewers, gas mains, heating tunnels and ducts. Power cables, telephone cables, etc., at the following hospitals: Ontario Hospital, Thistletown, Ontario Hospital, Woodstock (Epileptic and T.B. Sections).

In addition, a complete re-survey was carried out at the Ontario Hospital, Hamilton, and the site plan drawings for same, brought up-to-date.

Respectfully submitted,

H. E. Bushlen, P.Eng.,

Chief of the Sanitary Engineering Division.

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# CONTRACTS OVER \$50,000.00 FOR FISCAL YEAR 1965-66

Amount	\$ 175,300.00	72,000.00	62,907.00	95,700.00	64,000.00	1,281,555.00	147,620.00	87,357.00	54,852.00	55,117.00	112,643.30	63,077.50
Contractor	Farquhar Construction Ltd., North Bay	Dominion Bridge Co. Ltd., Lachine, Quebec	Globe Elevator Co. Ltd., Toronto	Ellis-Don Ltd., London	A. Battaglia Construction Co., Guelph	Dunker Construction Co. Ltd., Kitchener	Sartori & Son Co. Ltd., Windsor	Babcock-Wilcox & Goldie McCulloch Ltd., Galt	Gas Machinery Co. Ltd., Hamilton	Gas Machinery Co. Ltd., Hamilton	Evans Construction Co. Ltd., Agincourt	Accurate Roofing Co. Ltd., Toronto
Description of Work	General trades – new addition	Two new boilers	University of Guelph, Four hydraulic elevators Guelph	General trades – water pumping station	May 26 University of Guelph, General trades – alterations and Guelph additions to Anatomy Building	General trades – Apartment type buildings	Water distribution system	Steam generating unit	Conversion of boilers	Conversion of boilers	Excavating, back filling, rough grading	Re-roofing various buildings
Date Job Location	April 30 Haileybury, Registry Office	May 3 Woodstock, Ontario Hospital	May 3 University of Guelph, Guelph	May 6 London, Ontario Hospital	ay 26 University of Guelph, Guelph	June 2 Penetanguishene, Ontario Hospital	June 3 Wheatley Provincial Park	June 14 University of Guelph, Steam generating unit Guelph	June 21 North Bay, Ontario Hospital	June 21 Orillia, Ontario Hospital	Aug. 13 Toronto Centre of Science and Tech.	Aug. 19 North Bay, Ontario Hospital

# CONTRACTS OVER \$50,000.00 FOR FISCAL YEAR 1965-66 — Continued

Amount	\$ 194,500.00	226,000.00	203,500.00	232,100.00		58,546.00	74,400.00	59,300.00	4,580,000.00	93,000.00	67,325.00	\$8,060,799.80
Contractor	Ray St. Amour Construction Ltd., Timmins	Pilen Construction of Canada, Ltd., Cooksville	Cook & Leitch Ltd., Montreal	Lynch-Richards Construction Ltd., Weston		Toronto Iron Works, Ltd., Toronto	Burton Plumbing and Heating Ltd., Fort William	Toronto Iron Works Ltd., Toronto	Cook & Leitch/Perini Ltd., Montreal	Bedard-Girard Ltd., Ottawa	E. R. Norman, Ltd., Kenora	TOTAL
Description of Work	General trades	Sanitary trunk sewers	General trades – foundation and piling	General trades – Bailey bridge and steel fabricating building		Steam generating units	Mechanical and electrical trades Shop and Classroom building	Steam generating units	Construction of building	General trades – electrical duct system and alterations to communications building	General trades – Paint and carpentry shop	
Job Location	Cochrane, District Office Building	University of Guelph, Sanitary trunk sewers Guelph	Nov. 1 Montreal Expo '67	Toronto Department of Highways		Guelph, Ontario Reformatory	Fort William, Industrial Farm	Feb. 15 Penetanguishene, Ontario Hospital	Feb. 17 Montreal, Ontario Gov't. Bldg.	Mar. 30 Gravenhurst, Ontario Hospital	Mar. 31 Kenora, Department of Highways	
Date	Oct. 8	Oct. 27	Nov. 1	Dec. 13	- 9961	Jan. 5	Jan. 11	Feb. 15	Feb. 17	Mar. 30	Mar. 31	

### For The

### ONTARIO GOVERNMENT EXHIBITS

Over 6,000 people passed through the Province of Ontario Exhibition Building on the occasion of the official opening of the government building by Prime Minister John Robarts on the evening of August 19, 1965. For the second year the famed Garrison Band from Fort Henry in Kingston played music for the gala occasion. Refreshments were served.

The Canadian National Exhibition, which was attended by 2,962,500 people during the 15-day period, was held from August 20 to September 6, 1965. Government exhibits were from the Departments of Agriculture, Attorney General, Ontario Provincial Police, Education, Economics and Development, Energy and Resources Management, Health, Highways, Labour, Lands and Forests, Mines, Municipal Affairs, Reform Institutions, Tourism and Information, Transport, Water Resources, Ontario Hospital Services Commission, Provincial Secretary and Citizenship, Provincial Archivist and University Affairs. The theatre, which for many years was used for the projection of movies depicting the activities of the various departments, was utilized by the Department of Education this year for stage productions. New staff restroom facilities were provided in the basement of the building.

Close liaison with the exhibiting departments was maintained by the Department of Public Works prior to and during this period with building security beginning July 1 on a seven-day basis and lasting until five days after Labour Day. Carpentry, painting, floral and evergreen decorations and special lighting for settings were provided for the exhibits as well as maintenance and supervisory staff to maintain the whole in excellent condition for the duration of the event.

The Central Canada Exhibition was held in the exhibit area of Lansdowne Park in Ottawa from August 20 to August 28, 1965. The attendance was 644,422. As in previous years, the Department of Public Works co-related the Ontario Government display areas to present a cohesive display that drew much commendation from the attending public. Interior decoration, exhibit settings, sign work and the installation and maintenance of all mechanical services was supplied by the Department of Public Works. Exhibiting in this area were the Departments of the Attorney General, Economics and Development, Education, Health, Highways, Lands and Forests, Labour, Ontario Water Resources Commission, Reform Institutions and Transport. The Department of Agriculture exhibited in a nearby and separate building.

The Western Fair was held in London from September 10 to September 18, 1965. The attendance was 349,905. In other years certain government departments had exhibited at this fair in various locations. In 1965, for the first time, most of the government exhibitors were brought into one area in the Ontario Government Exhibits Building at Queen's Park. Planning, allocation of space, maintenance and supervision of the exhibits was under the control of the Department of Public Works. Great interest was shown in the model of the Queen's Park Office Extension Project which was on display in a prominent location. Government departments exhibiting were Agriculture, Attorney General, Education, Health, Highways, Labour, Lands and Forests, Ontario Water Resources Commission, Provincial Secretary and Citizenship and Reform Institutions.

The model of the Queen's Park Office Extension complex was also shown at the Norfolk County Fair at Simcoe in October. Some 60,000 people regularly attend this fair each year.

### **BOILER INSPECTION**

The boiler inspection work of this Department, as in previous years, was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs as to properly maintain and operate the power and heating plants in the various building groups referred to. In the case of the Ontario Hospitals and Reformatories, the reports as referred to were sent to the Departments of Health and Reform Institutions, respectively, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

I have the honour to be, Sir,

Your obedient servant,

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D. G. Creba,

Chief of the Architects' Branch.

Toronto, March 31, 1966.

## Report of the MANAGER, REAL ESTATE BRANCH

Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

#### SIR:

I have the honour to report on the work accomplished by the Real Estate Branch, Department of Public Works, for the fiscal year April 1, 1965 to March 31, 1966. During the past two years the activities of the Real Estate Branch have broadened in scope to include the Property Division, Land Surveys Division and the Office Accommodation Division.

The Office Accommodation Division is primarily concerned with space analysis surveys of all premises occupied by governmental departments in Metro Toronto and throughout the Province. Their work in the past year has taken in 234 projects totalling 3,239,876 square feet of floor space to accommodate a personnel of 21,903.

Of the 234 projects, 219 representing 1,235,850 square feet of space for a staff of 6,771 have been completed. The main highlight of this work has been concerned with the finalization of space allocation for Phase One of the Queen's Park Project, comprising the Hepburn, Ferguson and Macdonald Blocks. This involves about 409,930 square feet of space to various departments of government and the re-allocation of some 261,258 square feet in the Whitney Block. It has also meant the allotment of 140,000 square feet of space in the old and new Treasury (Frost) buildings.

Planning for Phase Two of the Queen's Park Project is currently in progress. Phase Two comprises the nine-storey Hearst Block and the 24-storey Mowat Block wherein a staff of 1,830 will be accommodated in 428,000 square feet of floor space. The Office Accommodation Division is also charged with parking space allocations.

The Property Division has an ever widening sphere of activity. The acquisition of lands for various Departments, Boards and Commissions of Government, is their particular objective with marked emphasis made during the past two years on acquiring lands for the Department of Lands and Forests' expanding parks program, and the necessary work for the A.R.D.A. projects, whose purpose is to secure suitable areas for reforestation purposes and the development of bird sanctuaries and wilderness areas.

Considerable progress has been made on the acquisition of land for a Provincial Park in Frontenac County which will encompass an area of about 11,500 acres. Approximately 9,000 acres, including Crown Land, has already been acquired leaving about 2,500 acres to obtain. Frontenac Park is possibly the largest undertaking in southeastern Ontario at the present time although others of lesser size are being negotiated and investigated. Another Park — Algonquin Park — is under constant investigation to eliminate leaseholds so as to return the park to its natural state. Algonquin Park is one of the oldest established parks in the province.

In Northern Ontario, negotiations are under way to acquire 170,000 acres for the Department of Lands and Forests, re Project A.R.D.A. No. 6013, these being parts of 66 Townships in the Parry Sound, Muskoka, Sudbury and North Bay districts. About 5,800 acres have been acquired to date. A 50-acre site has been acquired for the Department of Reform Institutions for a boys' training school in the Sudbury area.

At Kirkland Lake, two large buildings were acquired from Lake Shore Mines Ltd. for the Department of Education to be used for housing accommodation for students and faculty of the Institute of Technology. The Division has renewed and acquired new leased space in many northern areas for the Departments of Transport, Education, Welfare and combinations of various departments.



Leased property — O.P.P. detachment building, Glencoe

The Property Division is also engaged in a new form of lease arrangement which is fast becoming popular with various governmental departments. Over the past five years there has been an increasing demand and trend for the construction of what has been termed "special purpose buildings" which are leased by this Department for such governmental departments as the Ontario Provincial Police, Agriculture and Transport. Recently, a 10-year contract was completed on an O.P.P. building near Ottawa. The plans and specifications for such buildings are worked out in conjunction with officials of the Attorney General's Department and contractors interested in constructing buildings under such an agreement. It is felt that this phase of the Property Division's work will one day be a major aspect.



Leased property — O.P.P. detachment building, Midland

The Land Surveys Division continues to provide legal survey plans and descriptions for the acquisition and disposal of property for the various departments of the government, together with topographical plans for use by the Architects' Branch, for the design of new government buildings and additions to existing buildings.

During the fiscal year ending March 31, 1966, the Land Surveys Division received a total of 184 requests for survey information, which developed into 156 field projects and 323 plans and reports or office projects, based on the results of a land survey or other field investigation.

Of these requests, 136 field projects and 278 office projects were completed which, when added to the carry-over of work from previous years, totals 478 projects completed during the fiscal year.

In addition, the Land Surveys Division provided guidance and direction on all legal survey matters related to the acquisition of property for the Provincial Parks Program and land under the Agricultural Rehabilitation and Development Act.

The Property Directory is a combined effort of all Divisions but is the direct responsibility of the Property Management Sections. It is an index of all Government-owned and leased premises and is subject to monthly corrections. Three corrections were made during the year which brought the Property Directory up-to-date.

The following is a general summary of the work completed by the Divisions of this Branch during the fiscal year 1965-66:

#### Purchases, Leases, Sales and Valuations

349 Purchases	 \$ 7,996,812.00
35 Sales	 250,218.33
242 Leases	 8,016,023.43
41 Valuations	
667 Items	 \$16,263,053.76

#### **Appraisals and Valuations**

Insurance paid

Conservation Authorities		25 parcels	 \$	351,247.41
Water Lots	_	5 parcels		202,493.00
Other Valuations		11 parcels		91,890.00
		41 parcels	 \$	645,630.41

#### PROPERTY MANAGEMENT SECTION

Outgoing Rents —			
Canadian Funds	4,711 items	· moreone	\$ 3,363,760.83
U.S. Funds	36 items		23,754.00
Italian Lire	4 items		3,596,000 lire
German Funds (Marks)	12 items		18,000 DM
Incoming Rent	483 items		\$ 1,537,865.63
Taxes paid	26 items		28,801.82

Respectfully submitted,

E. J. Parker, Manager, Real Estate Branch.

3 items

30,473.83

## Report of the CHIEF OF THE ACCOUNTS BRANCH

Department of Public Works, Ontario, Toronto, March 31, 1966.

MR. J. D. MILLAR,
Deputy Minister of Public Works,
Parliament Buildings,
Toronto, Ontario.

SIR:

The following statements cover the monies received and disbursed on behalf of the Department of Public Works, Ontario, for the fiscal year which ended on March 31, 1966.

Ordinary Expenditure was up over the previous fiscal year by an amount of approximately \$1,163,000. Some \$600,000, or slightly over 50 per cent of this increase, was due to the cost of leasing and maintaining additional premises for Government Departments. Expansion of Communication Services accounts for another 11 per cent, approximately \$133,000.

The increase in the cost of repairs to Ontario Government buildings was approximately \$400,000. or 34 per cent over the previous fiscal year. This was due mainly to the number of emergency repairs and replacements that were carried out on heating plants, roofs, etc. The increase of 12 per cent or approximately \$149,000. in the cost of maintenance of Government buildings reflects a number of items: an increase in the number of buildings serviced, a number of prior year's accounts paid in the fiscal year under review, the cost of temporary help from service agencies and the purchase of steam from the Toronto Hydro-Electric System.

The latter two items are offset by a saving in salaries. In the case of the steam purchases, a future savings in repairs and replacements to heating plants is anticipated. Salaries, Ontario Government buildings, showed a decrease of some 10 per cent over the prior fiscal year despite salary increases which amounted to over \$200,000. This was due to a decrease in the complement of the cleaning and heating staffs.

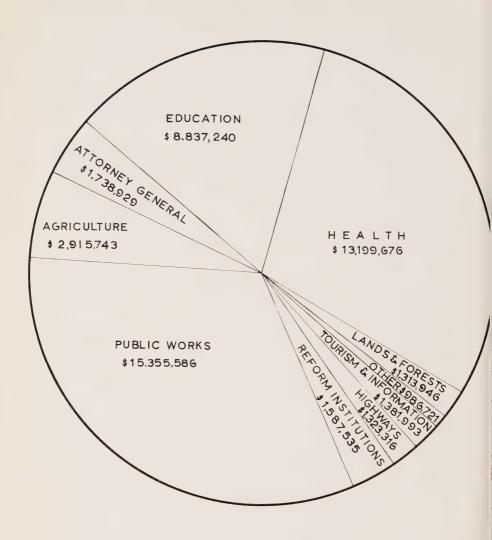
The amount shown under Capital Disbursements is \$1,400,000., less than for the prior fiscal year. This is a net figure. The gross figures for the Construction of New Buildings and Works, etc., reveal an increase in expenditure of some \$7,000,000. over 1964-65. Government of Canada grants in excess of \$9,000,000. were received in 1965-66 reducing the net expenditure to a level below that of 1964-65.

Respectfully submitted,

Chief of the Accounts Branch.

## ONTARIO DEPARTMENT OF PUBLIC WORK

# CAPITAL EXPENDITURES 1965-66



NEW CONSTRUCTION and CAPITAL IMPROVEMENT \$48,640,685 (GROSS)

## Report of the DEPARTMENT OF PUBLIC WORKS

Fiscal Year Ending March 31, 1966

#### REPORT OF THE ACCOUNTANT

The following figures show a small decrease of .053% in the net operations of the Department from the previous year. However, gross disbursements, excluding Federal Education grants of \$9,147,444.41 revealed an increase of 17.43%.

EX	PE	ND	ITL	JRE	S
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	EVLEIADLIÜKE	:5	
Fiscal Year 1965-66 1964-65	Ordinary \$14,944,609.78 13,781,548.27	Capital \$35,693,122.34 37,127,882.79	Total \$50,637,732.12 50,909,431.06
Percent Increase	\$ 1,163,061.51 8.44%	\$ 1,434,760.45	\$ 271,698.94
Percent Decrease	, ,	3.86%	0.53%

## SUMMARY OF EXPENDITURES For Fiscal Year April, 1965 to March 31, 1966

Total Icul	April, 1303 I	0 March 31, 1	966
Service Main Office — Administration	Ordinary	Capital	Total
expenses, etc.  Maintenance and Repairs —	\$ 1,166,515.97	\$	\$ 1,166,515.97
Government Buildings Leased Premises —	9,816,268.57		9,816,268.57
Rentals, etc. Public Works — Dams.	3,757,468.30		3,757,468.30
Docks, Locks, etc. Public Buildings	103,794.18	848,045.33	951,839.51
Miscellaneous	100,562.76	34,845,077.01	34,845,077 01 100,562 76
	\$14,944,609.78	\$35,693,122.34	\$50,637,732.12

#### STATEMENT OF REVENUE

• • • • • • • • • • • • • • • • • • • •	THE STATE OF KEAP	ENUE	
Commissions on Telephones Sale of Material Rentals Perquisites Building Equipment Miscellaneous Sale of Property Plan and Contract Security Deposits	47,542.43 1,296,546.37 1,923.00 2,039.75 6,912.74	219,934.51 27,065.00	\$ 8,422.41 47,707.43 1,296,546.37 1,923.00 2,039.75 6,912.74 219,934.51 27,065.00
	\$ 1,363,386.70 \$	247,164.51	\$ 1,610,551.21

## Statement of EXPENDITURES, MAIN OFFICE MAINTENANCE, REPAIRS AND CONSTRUCTION OF PUBLIC BUILDINGS

For Fiscal Year Ending March 31, 1966

#### ORDINARY

Service	Amount	Amount
MAIN OFFICE Minister's Salary	\$ 12,000.00 819,484.77 13,630.13 131,995.74 36,558.14 43.45 109,283.12 43,520.62	\$ 1,166,515.97
ONTARIO GOVERNMENT BUILDINGS Salaries — Maintenance Staff Maintenance — Fuel, Electricity, etc Communication Services Furniture, Furnishings and Equipment Repairs, Alterations and Incidentals	\$3,522,933.11 1,149,835.93 1,327,466.42 53,265.80 3,765,767.31 \$9,819,268.57	
Deduct Rentals	3,000.00	
		\$ 9,278,983.07
LEASED PREMISES Rentals and Expenses		\$ 3,757,468.30
MAINTENANCE OF LOCKS, BRIDGES, DAMS AND DOCKS, ETC. Maintenance		\$ 103,794.18
Preparing and installing exhibits for Government Departments, including costs of electric services and other expenses in connection therewith.  Dredging — Muskoka	\$ 48,111.62 \$ 2,720.00	
Dredging in the Muskoka Lakes	Ψ 2,720.00	

Service  Aid — Remedial Works, etc. — Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor in Council.  Municipal Drainage, including grants in aid thereof.	Amount \$ 49,467.60 263.54	
TOTAL ORDINARY EXPENDITURE		\$ 100,562.76 \$14,944,609.78
CAPITAL		
PUBLIC BUILDINGS  To provide for the construction of new buildings and works, purchase of lands and buildings, alterations equipment and extension of services to existing buildings and works and the purchase of construction plant and equipment and materials for stores and expenses in connection therewith		\$34,845,077.01 <u>848,045.33</u> \$35,693,122.34
SUMMARY		
ORDINARY EXPENDITURE  Main Office, Maintenance and Repairs of Government Buildings, etc  CAPITAL DISBURSEMENTS  Public Buildings and Public Works		\$14,944,609.78 35,693,122.34 

D. WALKER, Chief of Accounts Branch.

TORONTO, March 31, 1966

## Report of the CHIEF OF THE PURCHASING BRANCH

Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,
Deputy Minister of Public Works,
Parliament Buildings,
Toronto, Ontario.

#### SIR .

I take pleasure in submitting a summary of the work carried out in the Purchasing Branch for the fiscal year ending March 31, 1966.

During the year prices generally increased, both in materials and contracts, and this trend is still continuing. Following is a summary of the purchase commitments for the year ending March 31, 1966:

	Orders Issued	Value	Estimated Federal Sales Tax Saving
General Construction Contracts	596	\$31,954,368.86	\$1,437,947.33
Advertisements	558	27,355.10	
Construction Materials (lumber,			
hardware, paint, cement, etc.)		736,683.36	50,729.75
Plumbing and Heating		713,917.89	60,402.12
Electrical		615,627.18	58,186.87
Furniture, Furnishings and			
Equipment	4 500	2,641,787.14	263,656.51
Cleaning Supplies		74,009.92	6,424.17
Construction Machinery		229,489.44	13,769.37
Equipment and Vehicles	ĺ		
Special Services	9,526	528,171.24	36,971.99
Emergency Purchases, etc.,			
Queen's Printer		155,097.92	9,305.88
	24,288	\$37,676,508.05	\$1,937,393.99

In the Construction Equipment division, we have taken steps to reduce our inventory. Under this division our safety program has been implemented to add one new safety inspector to staff. We now have a total of four inspectors who travel across the province, checking all buildings owned by the provincial government as to safety measures on government construction projects.

In the division of Stores and Surplus, inventories have increased slightly due to the expansion of maintenance work in the various regional districts and this division disposed, by tender, \$45,586.72 in obsolete equipment.

The Contract Division showed an increase in the number and value of contracts issued. On January 1, 1966, the Department of Public Works adopted a new system of Federal Sales Tax rebates on Contract work. On all contracts the contractor pays all taxes and the Department claims a rebate from the Federal Government for these taxes. This system is the result of many discussions with the Federal Sales Tax Department and relieves the Contract Division of issuing orders for materials on behalf of the general contractor. The following is a list of the number and value of the contracts issued during the year:

Job Range	Number		Value
0 — 500	202	33.8%	\$ 49,097.79
500 — 750	51	8.6%	30,944.88
750 — 1,000	37	6.2%	32,084.71
1,000 — 1,500	57	9.6%	70,719.72
1,500 — 3,000	62	10.4%	132,099.74
2,000 — 5,000	51	8.6%	204,163.57
5,000 — 10,000	53	8.9%	396,303.37
Over 10,000	83	13.9%	31,038,955.08
	596	100%	\$31,954,368.86

Respectfully submitted,

J. W. McCormack, Chief, Purchasing Branch.

## Report of the CHIEF OF THE PERSONNEL BRANCH

Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,
Deputy Minister,
Department of Public Works,
Parliament Buildings,
Toronto, Ontario.

#### DEAR SIR:

I am pleased to submit the following report of the work carried out by the Personnel Branch during the fiscal year 1965-66.

#### Recruitment

The career program of advertising within the department was continued and 196 vacancies were advertised, with 106 being filled by selection of the Rating Committee. The Department of Civil Service provided sufficient applicants to suitably fill 82 vacancies in Metropolitan Toronto. Our Recruitment Officer filled 72 caretaking services' vacancies in Metropolitan Toronto by recruitment outside the service. Six vacancies were filled by the Regional Offices through recruitment from outside the service.

#### **Training and Development**

Traditional and effective on-the-job training continued. Sixteen employees received a 50 per cent subsidy of tuition fees for courses related to the duties of their positions. Twelve employees proceeded on courses with full costs being borne by the department. Ten of these employees participated in the Certificate Public Administration Course conducted by the Ryerson Polytechnic Institute and the University of Toronto.

Fourteen employees participated in courses conducted by the Department of Civil Service, with 10 of these employees attending Supervisory or Management Training Courses.

#### **Position Administration**

General progressive organization changes in several branches took place which, together with the incorporation of many unclassified staff positions under the Public Service Act, resulted in the preparation of 220 new position specifications and the revision of 237 position specifications.

There were 138 position audits carried out to ensure appropriate classification or the need of these positions. Ten new class series were prepared and submitted to the Department of Civil Service.

#### **General Administration**

There were 3,093 salary increases processed through merit increases, salary range revisions and 159 promotions. Appointments to probationary staff totalled 199, 30 of these being transfers from the unclassified service. Eightyfour probationary staff members were appointed to regular staff.

Attendance and accrued credits records were maintained for all of our classified staff as well as Groups Two and Three of the unclassified staff, with attendance credit statements supplied to each employee as at December 31, 1965.

Separations from the Service totalled 214 being composed of 127 regular staff, 77 probationary staff and 10 Group three, unclassified staff. All leaves of absence with pay, including 120 covered by the Workmen's Compensation Act totalled 257. Leaves of absence without pay totalled 121.

During this period to November 30, 1965, I also served as a member of the Salary Administration Committee, Department of Civil Service, representing the Personnel Council, as well as sitting as a member of the Public Service Classification Grievance Committee on several occasions throughout the fiscal year.

Yours respectfully,

O. M. MITCHELL,

## Report of the CHIEF OF THE SERVICES BRANCH

Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

#### DEAR SIR:

I have the honour to report on the work accomplished by the Services Branch of the Ontario Department of Public Works for the fiscal year April 1, 1965 to March 31, 1966, which was the first full year this Branch was in operation.

The Services Branch is composed of six Divisions: Fire Safety, Caretaking Services, Reproduction and Printing, Central Registry, Horticulture and Landscaping, and Telephone Services.

#### Fire Safety

The Fire Safety division is responsible for carrying out inspections of the various government-owned buildings in Metropolitan Toronto and making recommendations for the installation of systems and equipment for the safety of occupants. This Division is also responsible for setting up proper fire-evacuation plans for occupants of buildings. In the fiscal year ending March 31, 1966, fire-evacuation programs have been established in most of the government-owned buildings in Metropolitan Toronto and these programs will be continued in the new fiscal year.

#### **Caretaking Services**

The Caretaking Services division administers and performs building services, elevator operation, security and general office cleaning maintenance to all government-owned buildings in the Metropolitan Toronto area. During the past fiscal year this service was provided to 23 government-owned buildings containing an area of approximately 3,000,000 square feet.

This division is also responsible for the policing of all government-controlled parking lots in the Metropolitan area.

The services of attendants, ushers, etc. were provided by this division for all ceremonial receptions and functions held at the Main Parliament Buildings during the year.

During the year studies were commenced on contract cleaning versus staff cleaning. The reason for conducting these studies was to determine whether buildings can be cleaned more economically by use of private companies on a contract basis.

#### **Reproduction and Printing**

This division performs the function of a central area within the department for large scale reproduction and duplicating service for the department, and although work is done for other departments it is on a cost recoverable basis.

#### **Central Registry**

This division is responsible for the custody of the department's records, including all correspondence. The microfilming program being carried out by the department is also the responsibility of this division. This program started in the spring of 1964 and, to date, over 1,200,000 departmental documents have been microfilmed.

During the past year this division worked in close liaison with the Provincial Archives Department and many departmental documents of historical nature were released from the department's files and deposited with the Provincial Archivist for permanent retention.

Studies were initiated for the proposed implementation of a reference library for the Department.

#### Horticulture and Landscaping

This division is responsible for the groundskeeping service provided to government-owned buildings in Metropolitan Toronto and the work entails the installation and maintenance of lawns and flower beds, and removal of snow, ice and debris from sidewalks, parking lots etc., around the provincial buildings in Metro. This division also provides the floral decorations in the Main Parliament Buildings during the festive season and other social functions. Expenditure during the year for this service was approximately \$125,000.

#### **Telephone Services**

This division is responsible for leasing and procuring suitable telephone systems for all provincial departments, and also provides service for many of the commissions, boards and foundations. It is also responsible for leasing long distance facilities for voice, teletype and data transmission.

This division is also responsible for the provision of internal intercommunication systems to government departments, agencies, etc., and these are purchased on a tender basis unless it is proven to be more economical to lease the system. During the year, due to the growth of government, the demand by departments for additional and improved service caused the "Centrex" telephone system to grow by the installation of an additional 860 telephone sets and 560 locals. Additional terminals and automatic switches were installed on the sixth floor of the Whitney Block to provide the facilities to accommodate this expansion as well as providing for future growth. To effect greater savings in long distance telephone costs, 13 new localities were added to the inter-city network. At the end of the year the "Centrex" system serving government offices in the downtown Toronto and Downsview areas included in addition to switching equipment the following: 7,566 telephone sets, 4,566 working locals, 13 main switchboard positions, 57 inter-city lines serving 146 localities, 240 direct-in-dialing trunks, 342 ninth level outgoing trunks, 40 incoming Empire Exchange trunks.

Work began on the conversion to automatic service of the government-owned and operated manual telephone system in the Burwash Industrial Farm. The manual system was sold to the Bell Telephone Company with the agreement that it would replace it with up-to-date equipment. In its place a modern dial automatic system was installed which provides service to 150 extensions throughout the institution. A by-product of this transaction was the provision of subscriber telephones for the residents of the Village of Burwash, who prior to the sale had no telephones in their homes. The subscriber service, for which standard telephone rates apply, is connected to the closest commercial Bell Telephone exchange located in Estaire. Publication of the annual Ontario Government Telephone Directory is also the responsibility of this division.

Restoration of a number of works of art, forming part of the Government art collection, was carried out during the year.

Respectfully submitted,

L. Briscoe,

Chief of Services.

## Report of the CHIEF OF THE LEGAL BRANCH

Room 6312, Whitney Block, Parliament Buildings, Toronto, Ontario, March 31, 1966.

MR. J. D. MILLAR,

Deputy Minister,

Department of Public Works.

SIR:

This is a short report on our activities in the Legal Branch for the fiscal year ending 31st March, 1966.

We have again experienced a very active year, reflecting the many and varied activities of our Department. In particular, there was a marked increase in real estate transactions, both in the acquisition of new properties and in the leasing of space for Government use. Sales of properties and the granting of Easements and Licences of Occupation over properties owned by the Department continued at a normal level.

During the year we experienced a steady growth in our insurance work arising from the Department's construction program.

We also prepared a substantial number of miscellaneous Agreements, including Agreements pertaining to operations of Cafeterias in some Government buildings and for the installation of Municipal services for our buildings.

In particular, it is of interest to record our participation with officials of other Ontario Government Departments in drafting some of the Agreements for our Government's participation in Expo '67.

Respectfully submitted,

D. Y. Lewis,

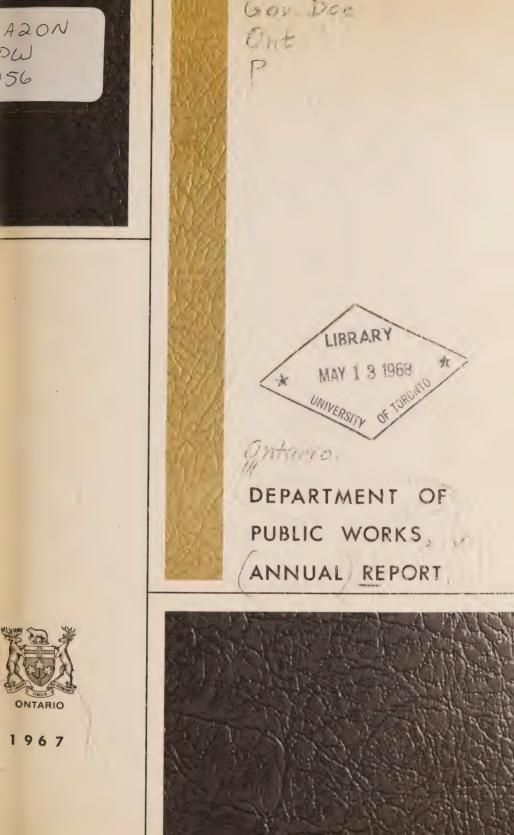
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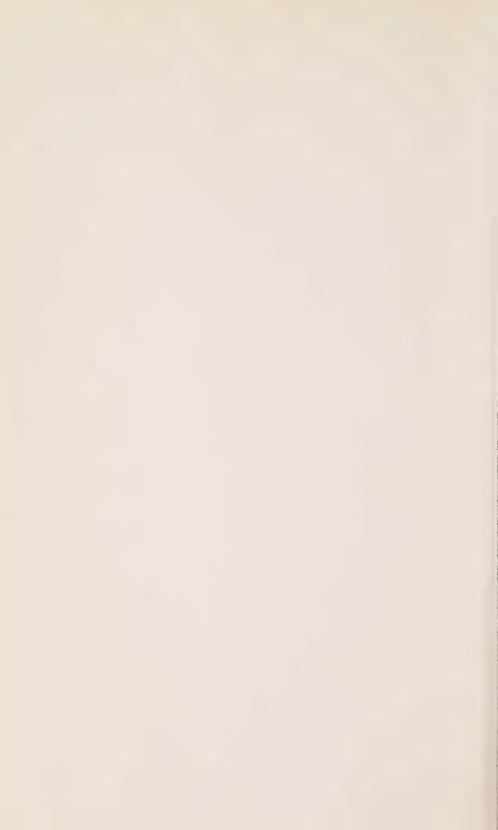
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# Report of the Minister of Public Works

**Province of Ontario** 

For the Year Ending March 31, 1967



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THE HONOURABLE RAY CONNELL

Minister of Public Works



THE HONOURABLE WILLIAM EARL ROWE, P.C. (C) Lieutenant-Governor of the Province of Ontario

#### YOUR HONOUR:

The undersigned has the privilege of presenting for the information of Your Honour, and the Legislative Assembly, the Annual Report of the Department of Public Works for the year ending March 31, 1967.

MINISTER

THE HONOURABLE RAY CONNELL, Minister of Public Works, Parliament Buildings, Toronto, Ontario.

SIR:

I am pleased to forward to you the Report of the Department of Public Works for the year April 1, 1966 to March 31, 1967.

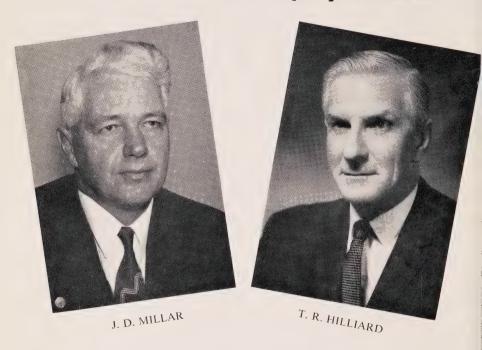
DEBUTY MINISTER OF DUDY OF WICH

DEPUTY MINISTER OF PUBLIC WORKS

Department of Public Works, Toronto, March 31, 1967.

#### DIRECTORY

## J. D. Millar Relinquishes Post T. R. Hilliard New Deputy Minister



Mr. J. D. Millar, who had held the post of Deputy Minister of Public Works since January 1, 1959, relinquished his appointment on February 28, 1967. Mr. T. R. Hilliard — appointed Associate Deputy Minister of Public Works on May 16, 1966 — succeeded Mr. Millar as Deputy Minister of the Department on March 1, 1967.

Prior to coming to Public Works, Mr. Millar had been Deputy Minister of the Department of Highways for many years. Mr. Hilliard brings to his new position a distinguished record of public service which included two years as Assistant Deputy Minister of Agriculture and four years as Deputy Minister of Energy and Resources Management.

## THE DEPARTMENT OF PUBLIC WORKS

#### **FUNCTION**

The primary function of the Department of Public Works is to provide and maintain buildings and works to accommodate the requirements of the various departments and institutions of the Ontario Government. This involves the purchase of land; planning, design and construction of buildings; or, alternatively, leasing the necessary space and facilities. Included is a large program of Land Acquisition for Provincial Parks and the Agricultural Rehabilitation and Development Administration. A significant activity is the purchase and supply of materials for many of the departments.

#### ORGANIZATION 1966-1967

In order to carry out this function, the Department is organized into seven branches:— Architects; Accounts; Real Estate; Purchasing; Services; Legal, and Personnel, each co-related and dependent on the others for maximum effectiveness. The head of each Branch reports directly to the Deputy Minister who, in turn, reports to the Minister.

Each branch of the Department is further divided into sections with specialized activities.

Re-organization of the Department is presently under discussion and will become apparent in the ensuing year. This comes about as the result of the pyramiding responsibilities of the Department over the years. Today, the program of the Department is of such magnitude that more senior decision-making positions are required and, a broadening of the delegation of responsibilities, particularly in the Regional Offices, has become necessary.

These are the essential reasons for the proposed re-organization if the Department is to keep in step with the pace of modern business practice. The changing organization of Public Works will be dealt with in succeeding Annual Reports but its present structure, with a description and report of each Branch, is set out in the following pages.

#### ARCHITECTS' BRANCH

This branch is headed by a chief architect, with an assistant chief architect. Four project architects are assigned to co-operate with specific groups of government departments to establish architectural and engineering requirements for anticipated projects.

Although this branch employs a number of architects, engineers, designers and specification writers, the volume of new buildings needed each year by the provincial government requires that private firms of architects and engineers be engaged to assist the department on specific projects.

The Plans and Specifications section of the Architects' Branch is responsible for the preparation of preliminary studies and sketches, and subsequent working drawings and specifications for all architectural and engineering works to be executed by contract, or day-labour forces. This section also supplies colour sketches and drawings for interior design, and drawings and specifications for specialized equipment required for installation in hospitals and institutions. It also issues the necessary documents to the Purchasing Branch for tender call on contract work.

Five engineering sections, each with a chief engineer, function with this branch. These are: Structural, Mechanical, Electrical, Sanitary, Civil. Civil Engineering is engaged in a continuing program of planning, designing and constructing new dams to control and conserve water supply, particularly in Crown Lands and park areas.

To control and supervise construction methods and building maintenance on the many projects under way throughout the province, five regional offices are set up under the direction of a Chief of Construction who is responsible for all contract and day-labour projects.

Another important phase is carried out by the Contracts section, which processes payments to contractors during the actual construction period. Adjustments and contract claims problems are also handled here. It provides detailed cost estimates of projects in various stages of progression.

### REPORT OF THE ARCHITECTS' BRANCH

During the fiscal year under review, the Department of Public Works was engaged in a capital commitment program amounting to \$232,790,000 for projects under construction or in some phase of planning. Of this sum, \$203,482,000 was approved for construction and \$29,308,000 for working drawings with \$68,739,000 actually under construction.

Priority was given to the requirements of the Departments of Education and Health but an extensive schedule of work was followed through for other Departments of Government which is indicated in the following outline.

#### LEGISLATIVE AND DEPARTMENTAL BUILDINGS

## STEADY ADVANCE MADE IN THE QUEEN'S PARK OFFICE EXTENSION PROGRAM

Construction of the Queen's Park Project, which began on January 11, 1965, advanced steadily during the year to the point where occupation of the Hepburn Block (Southwest Tower) was anticipated in the late summer or early Fall of 1967. Work on individual buildings of the Project reached the following stages:

#### **HEPBURN BLOCK (Southwest Tower)**

Exterior work on this 11-storey tower was essentially completed. Installation of lighting equipment on typical floors (third floor through to 11th floor) was well advanced. Floor covering of rubber tiling was finished with the installation of plumbing facilities also completed.

Electrical services: both Bell Telephone Company and Public Works Communications have completely installed communication wiring on various floors of the Hepburn Block. Plastering work was finished on typical floors from the third floor up. Mechanical work (heating, air conditioning, etc.) was completed on this tower. Installation work on metal partitions has been started.

Work reached the final stages of installation and adjustment on the elevator Bank (seven elevators) in this tower. Painting followed closely the plastering accomplished to this date.

#### TWO YEARS OF PROGRESS ON

January 1965



The site looking southwest as excavation work began



Close up of steamshovels at work on southwest corner

# Phase 1, QUEEN'S PARK PROJECT

January 1967



Site, looking north — Hepburn block in foreground, Ferguson block at rear



Site looking northwest — Ferguson block central background

Installation of windows and blinds advanced to completion. The track-mounted installation of the power scaffold on the roof was also completed except for power hook-up.

The granite and marble installation was well under way in the foyer and elevator lobby. Mechanical work progressed in the first and second basement areas. Work on the colonnade section was generally restricted to favourable weather conditions.

#### FERGUSON BLOCK (Northwest Tower)

Exterior cut stone work reached the final stages on this 14-storey tower. Mechanical: roughing-in of typical floors (third to 14th) was well advanced. Various forms of fire proofing — poured concrete, vermiculite, plaster, asbestos, etc., were being installed.

Some plastering was being done in the lower floors of the tower. Installation of the bank of elevators (eight elevators) proceeded in pace with general progress in this area. Installation of cooling towers for the air-conditioning system was begun. Mechanical and electrical trades work progressed in the first and second basement areas.

## **MACDONALD BLOCK (Central Core)**

Most of the exterior work was completed on this two-storey central core structure. Operations were concentrated on the interior particularly in the basement Health Centre area and the Cafeteria, kitchen and servery sections of the first floor where quarry tile, glazed wall tile and installation of walk-in refrigerators were well advanced.

Work was continued on the second-floor Assembly Hall and adjoining Committee rooms; also in the mechanical rooms of the first and second basements of the building. This area will contain the main controls for temperature, humidity, etc., for the entire project.

Steam mains and returns for temporary heat were installed between the Whitney Block (East Block) power plant and the main mechanical room of the new development. Temporary use was made of the Grosvenor Street and Wellesley Street ramps serving the two basement levels — the Wellesley Street ramp serves the first basement level plus shipping and receiving on the second basement level.

# GENERAL DATA ON PHASE ONE OF THE QUEEN'S PARK PROJECT

Heating requirements for the project will be provided by the completely rebuilt boiler room and plant located in the basement of the Whitney Block.

This modern heating plant is a combined gas or oil fired installation and will adequately meet the heating requirements of the entire Queen's Park Office Development Project, as well as continuing service to the existing buildings in the Queen's Park area.

Year-round temperature and humidity control will be maintained by a custom designed air conditioning system. Chilled water for air conditioning is provided by four 1,500-ton chilling machines designed to chill 2,560 g.p.m. of water from 56°F to 42°F.

Each chilling machine is supplied with approximately 5,000 g.p.m. of condenser water pumped through 30-inch condenser pipes from four cooling towers located on the roof of the northwest tower (Ferguson Block).

Nerve centre of the mechanical system is situated in the first basement of the Macdonald Block two-storey central core building. From here, the performance of all systems in the project can be controlled. Instruments will scan temperature and humidity readings placed throughout the various buildings, typing out a permanent record of readings and sounding an alarm when off-normal readings occur.

A continuous electrical power supply in the event of hydro failure is assured by a completely independent diesel-driven power generator supplying all essential motors and lighting. Electrical power is derived from five Toronto Hydro Electric System transformer vaults located adjacent to the Queen's Park project.

The supply from Toronto Hydro is at 240/416 volts, three-phase, four-wire to the main switchgear located at basement areas in four corners of the project. From these main distribution centres, a system of bus ducts carries power to various load centres in the buildings.

Power and telephone requirements for individual desks in the offices will be supplied by floor-mounted outlets located under the desks. These outlets are, in turn, supplied from a cellular metal floor distribution system with a trench-type transverse metal header. This system is designed for maximum flexibility in locating floor outlets and for future expansion.

A few points relating to quantities of electrical materials used on Phase One of the Queen's Park Project are:

Approximately 800 lighting fixtures on a typical floor of the Hepburn Block (southwest tower).

There are about 9,000 lighting fixtures in the entire building.

One hundred thousand feet of conduit, and 250,000 feet of wire and cable, will also be installed in the Hepburn Block.



Inquiry desk and reference section of the renovated Legislative Library



The refurnished Members' lounge



The newspaper reading area



General view of legal section

#### MAIN PARLIAMENT BUILDING

The alteration and renovation program to bring the Legislative Library facilities up to modern standards has been completed. On February 1, 1967, the Provincial Secretary, the Honourable Robert Welch, Q.C., and Minister of Public Works Ray Connell shared in a ribbon cutting ceremony to mark the occasion.

Today, the Legislative Library is modern in every respect. The face-lift has required major renovation involving new ceilings, partitions, structural changes, ventilation, and lighting. The work of the interior design has been excellent.

The library contains over 140,000 volumes and a copy of practically every newspaper printed in Ontario. The fact that it is as old as the Legislature must not be allowed to give the impression that the collection is entirely retrospective as, each year, 1,500 new volumes are added to the collection.

Renovations were completed on the third floor for Members of the Legislative Assembly. The Lieutenant-Governor's suite was redecorated and supplied with new drapes. A suite of offices was renovated and furnished for the Minister of the newly created Department of Financial and Commercial Affairs. Offices were also set up for the Ministers of Labour and Reform Institutions. Committee rooms one and two were also renovated, supplied with new lighting, P.A. recording systems and air conditioning. A dumbwaiter was installed in the Legislative Library of the North Wing. Work was started in rooms 158-183 to contain Parliamentary exhibits.

#### WHITNEY BLOCK

Few changes were made at the Whitney Block this year as some departments will be moving to new quarters in the first-phase buildings of the Queen's Park Project. Major renovations will be made when areas have been vacated.

# DEPARTMENT OF AGRICULTURE AND FOOD

Over the years many millions of dollars have been expended on major and minor projects for the Department of Agriculture and Food at the Agricultural and Veterinary Colleges at Guelph, Kemptville Agricultural School and the Western Ontario Agricultural School at Ridgetown.

Further developments are planned but the past year has been one of temporary curtailment with \$1,043,521.08 expended on Capital Works.

The reduction to a large extent is because those two old and highly respected institutions — the Ontario Agricultural College with its Macdonald Institute for home economics, and the Ontario Veterinary College (dating back to 1874 and 1862 respectively), were incorporated into the University of Guelph in 1965. The last of many large Public Works projects at the Guelph site were the Chemistry and Microbiology building and the Poultry, Pathology, Wild Life Diseases and Virus Research Institute which in 1965 cost over \$6 million to build, equip and furnish.

In the past year, \$654,954,60 was spent at the University on previous commitments for additions, alterations and construction, in addition to \$110,027.77 for the purchase of property and for farm drainage in connection with the Research Station.

Capital expenditures totalled \$125,544.84 for construction and alterations at the Kemptville Agricultural School. Expenditures at the Vineland Horticultural Experiment Station for construction, including the irrigation system, amounted to \$60,295.96.

Tender documents for two projects at Ridgetown neared completion. One was for a new dining hall and kitchen and the other for alterations and additions to the boys' residence. The combined jobs are estimated to cost over \$800,000.

Planners worked on a number of projects. Approved for planning were: an agricultural services building for the Horticultural Research Station at Simcoe; a service building and a new dairy research barn for the Elora Research Station and a new education building for New Liskeard Demonstration Farm. In addition, a master plan for development of Kemptville Agricultural School was placed on the boards. Part of the planning included a field house for crop services as well as a new men's residence and sports building.

# DEPARTMENT OF THE ATTORNEY GENERAL

For a number of years the impetus of the building program for the Attorney General's Department has been quite marked in accordance with a long-range plan of providing administrative units for the Ontario Provincial Police in centres strategically located throughout the province.

Last year four new district headquarters buildings were built at Downsview, Mount Forest, Peterborough and South Porcupine, near Timmins. In the fiscal year under review a contract was let for another district headquarters at Sault St. Marie with one for Kenora nearing tender call. Contracts were also awarded for detachment buildings at Fort Erie and Guelph.

## HEADQUARTERS BUILDING FOR SAULT STE. MARIE

Tenders closed July 14, 1966, for the construction of a district headquarters building at Sault Ste. Marie. Three general contractors tendered for the project as follows:

NEWMAN Bros. COMPANY LTD, St. CATHARINES	.\$348,953.00
McLarty Bros. & Brodie Ltd., Sault Ste. Marie	.\$349,363.00
George Stone & Sons Ltd., Sault Ste. Marie	.\$372,257.00

The contract was awarded to Newman Bros. the following month and construction began immediately. Steady progress was made during the year with the project 85 per cent completed at the end of March 1967.



New district headquarters' building, Sault Ste. Marie

This latest headquarters building has been located on Highway 17, about one mile north of the Davey Home for the Aged. In most respects it is similar to those built at Mount Forest, Peterborough and South Porcupine.

The building approximates 101 by 35 feet and comprises a basement, first and second floors. It is of steel frame, concrete block, external face brick with built-up roof and aluminum facia, flashings and window frames. At the rear of the main building is a three-bay garage and large parking area.

General office accommodation is on the first floor in addition to private offices for radio and telex communications, sergeant, corporal, stenographers' room, detention area, interrogation room, janitor's supplies and male and female washrooms.

The second floor has a private office for the inspector, five offices yet to be allocated, as well as areas for identification, dark room and report reader. Other accommodation includes a women's lunchroom, office equipment and filing room, secretaries' office, janitor's supplies and washrooms.

In the basement will be a large conference room, lunchroom, various storage areas including a 'secure storage' room for stolen articles, locker room, boiler and electrical equipment rooms, filing section and janitor's room.

Construction of the district headquarters building at South Porcupine was essentially finished last year. Some minor work, however, remained to be done and this was completed shortly after the turn of the fiscal year.

# FORT ERIE DETACHMENT UNDER CONSTRUCTION

In answer to a tender call issued for January 12, 1967, five contractors submitted the following bids for the construction of a detachment building at Fort Erie:

McCollom-McGowan Construction Ltd., Welland\$87,983.00	0
Frank Lawrence Construction Ltd., St. Catharines	
Gorham Bros. Construction Ltd., Fort Erie\$89,732.00	0
R. Timms Construction & Eng'g. Ltd., Welland	0
Guy Violino Construction Ltd., Fort Erie\$96,300.00	

The low bid was successful with confirmation of the general trades award given McCollom-McGowan Construction Ltd., early February. The 78 by 32 foot structure is being built facing on Main Street and bounded by Central Avenue and North Street.

It is single storey with no basement, of timber frame construction with brick veneer and asbestos type panel finishes and flat roof. It will be electrically heated. A three-bay garage with two storage rooms is included in the project

and provision has been made for parking 32 cars in a paved area. Total floor is 2,028 square feet.

Accommodation includes a general office and waiting room, three private offices, radio and telex rooms, staff office, a two-cell detention area, male and female washroom facilities, vaults and storage areas, and a room for janitor's supplies.

Construction reached 40 per cent. Completion of the detachment was expected in June 1967.



Artist's conception of the detachment building, Fort Erie

# CONSTRUCTION STARTED FOR NEW GUELPH DETACHMENT

Six contractors responded to a tender call for the construction of an O.P.P. detachment building at Guelph. Tenders closed February 16, 1967, with the following results:

Brandon Tile, Construction Ltd., Kitchener	.\$85,710.28
Mann Construction Company Ltd., Guelph	.\$86,990.60
A. Battaglia Construction Co. Ltd., Guelph	.\$86,995.00
Lenn Ariss & Company Ltd., Guelph	.\$87,770.00
Wilson Limited, Guelph	.\$97,975.00
Ronrica Construction Ltd., Downsview	.\$99,962.00

The low bid of Brandon Tile & Construction Ltd., was approved in March with construction starting the same month. The status at the end of the month showed excavation for the main building completed and in progress at the garage area. Forming for footings in the main building area was under way.

The detachment will be built to a new design. It is being erected on Silver Creek Parkway at Edinburgh Road and Bristol Street. It will be single storey, frame construction with brick veneer finish and flat roof. There will be no basement.

The floor area is 2,100 square feet. The building will contain a general office, interrogation room, rooms for stenographers, files, sergeant, corporal, vestibule and waiting room, staff lunchroom, vault and storage areas, janitor's supplies, and male and female washrooms. A three-bay garage with storage facilities will also contain the boiler and will be attached to the main building.

# COURT HOUSES AND REGISTRY OFFICES

#### LARGE RENOVATION PROGRAM AT MUSKOKA DISTRICT COURTHOUSE

Plans for an addition and extensive renovations to the Muskoka District Court House at Bracebridge reached reality when tenders were opened for this work on June 9, 1966. Four contractors bid for the project as follows:

Paul Carruthers Construction Ltd., Thornhill	. \$309,000.00
Sklar Construction Company, Toronto	.\$315,000.00
MacDonald Engineering Construction Co. Ltd., Toronto	. \$328,000.00
Farquhar Construction Company Ltd., North Bay	

The low bid submitted by Paul Carruthers Construction Company was accepted, work progressed steadily and had reached 95 per cent at the close of the fiscal year.

The project is a two-storey and basement L-shaped addition which provides about 5,000 square feet of floor space to existing facilities. It has been linked to the main building by vestibule entrance.

The new addition has, on the ground floor, an entrance porch, vestibule and lobby with a connecting corridor to the existing courthouse. The rest of the floor is divided into a magistrate's courtroom, judges' chambers, district court judge's office, and a magistrate's office with adjoining secretarial office—all with private washrooms. There is also a general office and male and female washrooms.

On the second floor will be the Family Court and waiting room area, judge's office, and offices for the crown attorney, probation officers and secretaries, as well as public and staff washrooms.

The basement will be devoted to storage areas and the boiler room. All floors have stairways and corridors linking the new addition to the existing building.

The addition is 84 by 80 feet on a steel frame. Construction is of external face brick with internal walls concrete block. Lay-in tile has been used for ceilings, resilient tile for floors and plaster for walls.

Existing courthouse alterations consist of modifications to male and female washrooms on first and second floors and partition work in the general office section.

## ALTERATIONS AT COCHRANE COURTHOUSE UNDER WAY

Alterations and additions to the Court House and Registry Office at Cochrane are currently in progress and well advanced at 50 per cent with completion date expected about June.

This is a much smaller project than that at Bracebridge. Three tenders were opened October 27, 1966. They were:

ROY CONSTRUCTION SUPPLY Co. LTD., TIMMINS	8,777.00
Charbonneau Construction Co. Ltd., Hearst\$3	5,872.00
Farquhar Construction Company Ltd., North Bay\$4	7,332.00

The award went to the low bid presented by Roy Construction Company and work on the project began February 23, 1967.

Nearing tender call was a large program of renovation for the courthouse and registry office building at Gore Bay, Manitoulin Island.

## FIRE MARSHAL

# FIRE TECHNOLOGY STRUCTURE TO BE BUILT AT GRAVENHURST

Construction was to commence early in the next fiscal year on a new Fire Technology Building for the Gravenhurst Fire College, a division of the Office of the Fire Marshal established in 1958. Not since 1957, when the



Artist's conception of the Fire Technology building, Gravenhurst

buildings belonging to the National Sanitorium Association were taken over and renovated for the purpose of establishing a Fire College, has there been any major expansion at this location.

Tender call for the new Fire Technology Building went out in February. 1967, to close March 30. Bidding on this project was very active with nine contractors making submissions. They were:

W. A. MacDougall Ltd., London	\$399,000,00
Andre Knight Limited, Orillia	\$408,000,00
Malan Construction Co. Ltd., Toronto	\$408.200.00
Alsby Construction Ltd., Thornhill	\$420,400.00
Farquhar Construction Ltd., North Bay	\$428,850.00
Mollenhauer Contracting Co. Ltd., Toronto	\$430,100,00
W. A. Stephenson Construction Co. Ltd., Willowdale	\$437,726.00
West York Construction Co., Weston	\$461,334.00
MacDonald Engineering of Canada Ltd., Toronto	\$526,000.00

Overall dimensions of the structure will be 160 by 122 feet with a total floor area of about 14,000 square feet. It will be two storeys in height and designed to provide for a future third floor.

The foundation will be of reinforced concrete on pile construction with a structural steel frame; the second floor and roof constructed of steel joints and frame. Exterior walls will consist primarily of a combination of checolate-coloured recessed brick and precast concrete panels with concrete block back-up. Windows and entrances will be framed in aluminum.

The four bay Fire Training Apparatus room on the first floor will accommodate two triple combination fire pumpers, a quintuple combination fire pumper, station wagon, pick-up truck and portable fire pumps for fire-fighting operations training.

The balance of the first floor will have administrative offices, textbook and stationery storage areas, and a Fire Mobilization Centre. The Centre (which will provide accommodation for Provincial Emergency Fire Control to coordinate the municipal fire departments of the province in the event of a national emergency), will be a completely self-contained unit with fallout protection. It will be used to train fire department officers in fire mobilization procedures as well as providing accommodation for an additional small classroom.

The second floor will have an amphitheatre-type classroom for 40 students and be equipped with an instructor's table and equipment for demonstrations. Provision has been made for two seminar rooms and instructors' offices, as

well as a small fire research laboratory, library, and office facilities for the Fire Research Group of the Fire Engineering Division of the Office of the Fire Marshal.

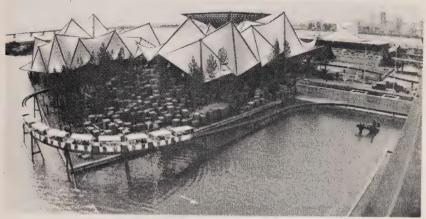
The fire research work will be limited to the examination of products which have been disclosed in fire investigations as contributing to the cause of fire and for the purpose of finding out ways that manufacturers may improve their products by reducing the fire hazard characteristics. The fire research will not include an approval or listing service which is left to the nationally recognized testing laboratories.

The additional buildings will provide for substantial improvement in the educational facilities at the College, particularly in the presentation of the Fire Protection Technology Course, as well as releasing space in other buildings where it is anticipated approximately 100 additional students may be accommodated at the College each year.

# **ECONOMICS AND DEVELOPMENT**

# ONTARIO'S EXCITING PAVILION AT EXPO NEARED COMPLETION

Ontario's distinctive pavilion at Expo '67, the Montreal World's Fair, was brought to the final stages of construction and readied for the grand opening in April.

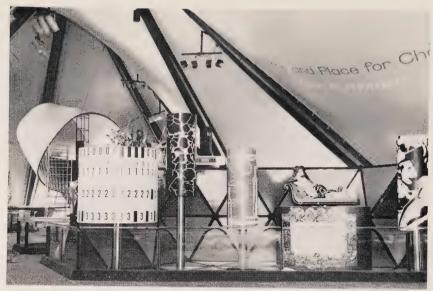


Artist's conception of the Ontario Pavilion, Expo '67, Montreal

The exciting pavilion, 115 feet high and uniquely constructed of plastic, steel, wood and glass, covers about 50,000 square feet of the 90,000 total land area of the Ontario exhibit. It was designed by Fairfield & Dubois, Toronto architects. A description appeared in the previous year's report.



Looking north: view of the Exhibits platform



Looking west: foreground "careers"; background "leisure"



"Teen" scene in the exhibit area

Construction of the building was a joint venture by Perini Quebec Inc., and Cook & Leitch Ltd., of Montreal. Costs of construction amounted to \$4,736,051.76 at the end of the fiscal period. The concept of the structures came under the aegis of the Department of Economics and Development.

# DEPARTMENT OF EDUCATION

The building program of the Department of Education has been immense in scope over the past few years. The past year has seen a new Ontario School for the Deaf established at Milton, a College of Education at London and a Vocational School at Sault Ste. Marie. This work has meant an outlay of \$18,979,881.90 on construction, furnishings and equipment.

# CONTRACT AWARDED FOR THE HAMILTON TECHNICAL CENTRE

In addition to the above, a \$16,500,418.00 general trades contract was signed in October 1966 to start construction of the Hamilton Technical Centre which has since been named the Mohawk College of Applied Arts and Technology.

Construction of this multi-million-dollar complex at the new 66-acre campus atop Hamilton's mountain, commenced in October of 1966 and gradually accelerated in pace. At the end of the fiscal year the project was 6.5 per cent completed with about 100 men employed at the site.

Designed by McIntosh & Moeller and Gerrie & Butler, Hamilton archtects, construction is being done by Robertson & Yates Corporation Ltd., (Ryco-Cape) under contract with the Ontario Department of Public Works.

In addition to lecture rooms, classrooms and a large library, the college building will have a college-size gymnasium, an auditorium seating 1,100, two large common rooms for students and two cafeterias.

Last year's Report carried a full description of the project. Construction is expected to be completed and the building ready for student activity about September, 1969. The anticipated student population will approximate 2,400.

Mohawk College, one of the 18 community colleges established in Ontario, is already in operation using the facilities of the former Hamilton Institute of Technology (incorporated into Mohawk College) and other buildings in Hamilton.

# MILTON SCHOOL FOR THE DEAF TO OFFICIALLY OPEN IN MAY

The end of March 1967, saw the completion of the sprawling educational plant known as the Ontario School for the Deaf at Milton. All buildings were in use with the exception of the Sports building where a small amount of work remained to be done. Furnishings were mostly in and plans were being made for an Official Opening on May 12, 1967.

The first school of this kind in Ontario was built at the western extremity of Belleville in 1864. But in the past decade the need for a second school became evident, and the site at Milton was selected. The May ceremony will officially conclude a six-year construction job at this location by the Department of Public Works for the Department of Education.

First-stage construction was completed in 1963. This comprised the junior school, staff residence, hospital, administration, laundry and boiler plant buildings and has cost \$5,563,008.09 to construct, equip and furnish as of March 31, 1967.



Senior Boys' residence and Sports building. View from Senior School.
Ontario School for the Deaf, Milton

The second-stage was started in October, 1964, and comprised the senior academic school, vocational school, senior boys' and senior girls' residences and a double gymnasium with connecting swimming pool. Costs for this phase of work amounted to \$5,618,559.65 to construct, equip and furnish. The total costs for the entire project at the end of the fiscal year were \$11,181,567.74.

Frid Construction Company Ltd., of Hamilton, was the general contractor for both phases of the project. Marani, Morris & Allan, Toronto, were associate architects.



The court area between Academic and Vocational Wings



Senior Girls' lounge



The auditorium



Hairdressing Class



Opportunity (Hobby) Classroom



Typical Hospital Ward



The Cafeteria



Teachers' Lounge



Auto Shop Classroom



Junior School — Typical Classroom



Woodworking Class

# COLLEGE OF EDUCATION AT LONDON FINISHED

The College of Education at London was finished and put in use at a cost of \$4,081,431.89 for the structure, furnishings and equipment. The contractors were Ellis-Don Ltd., of London, who began building the handsome structure during April, 1964. Work had advanced to 85 per cent at the conclusion of the previous fiscal year.

The design by London architect H. L. Hicks includes an open court surrounded by the academic, seminar and cafeteria wings with the shops wing branching off from these. Consulting engineers were: structural, Peter T. Miches and Associates; mechanical and electrical, R. A. Egan and Associates, both of London.

The site is at the intersection of Huron Street (Sarnia Gravel) and the Wharncliffe Road (Western Road). The College offers professional training for prospective secondary school teachers on academic, commercial and technical subjects. Normally, the capacity will be around 600, but plans include ready adaptation for 800.

## SAULT STE. MARIE CENTRE COMPLETED

The Ontario Vocational Centre at Sault Ste. Marie with accommodation for some 600 students was essentially finished at the end of the previous year and students and staff had occupied the buildings.

Some work of a minor nature remained, however, and this was carried forward during the year. This was in the nature of finishing hardware, painting, cleaning of brickwork, installation of conduit, wiring and connection of additional equipment. An inspection was made on August 22, 1966. Costs for the finished structure, furnishings and equipment totalled \$3,716,882.27 at the close of the fiscal year.

The centre has a total floor area of 160,000 square feet. The buildings have reinforced concrete footings and foundation walls, concrete slabs, steel frame, masonry walls and built-up roofing. They comprise a basement and two-floor classroom wing, single-storey shops and heavy equipment wings. The project was contracted to the Foundation Company of Canada, Sudbury Unit. Construction began November 26, 1963.

# ST. CATHARINES TEACHERS COLLEGE

Planning for the establishment of a Teachers College at St. Catharines had reached the near-tender-call stage. This College will consist of a three-storey

wing containing all office and instructional functions and student areas connected through a wide glazed entrance link to a lower auditorium block.

It has been designed as an integral part of Brock University on an attractive site in close proximity to the University central library tower, the entrance driveway, and the new lecture room complex now under construction.

This Teachers College will contain about 84,000 square feet and include offices for staff and general office functions, offices for instructors, common room areas for staff and students, a gymnasium with fixed spectator seating, an auditorium seating about 550 with complete stage facilities, a large library, lecture rooms and classrooms — both standard and specialized — to accommodate a student population in excess of 500 with unfinished areas for future classrooms as the demand dictates.



Artist's conception of the St. Catharine's Teachers College

In various stages of planning are: a Northern College of Applied Arts and Technology for Kirkland Lake; a Teachers College for Sudbury; a College of Education to be called the McArthur College of Education as well as two students' residences — one for boys and one for girls — at Kingston which will be allied with Queen's University. Extensive renovations are also planned at 555 Davenport Road, Toronto, to provide additional facilities for the Provincial Institute of Trades and Occupations, 37 Dartnell Avenue.

# DEPARTMENT OF HEALTH

Construction activity for the Department of Health continued unabated. The Central Health Laboratory on the MacDonald-Cartier Freeway at Islington was occupied and officially opened; the Clarke Institute of Psychiatry at College and Huron Streets in Toronto was also officially opened; the first-stage of the large reconstruction program at the London Ontario Hospital was brought to essential completion, while two new buildings were provided for the Ontario Hospital at Penetanguishene. One large contract was awarded. This was for second-stage construction at the London Ontario Hospital. Imminent approval to build was expected for the proposed new headquarters building for the Alcoholism and Drug Addiction Research Foundation in Toronto.

# CENTRAL LABORATORY IS FIRST REAL HOME

On January 11, 1967, the Central Laboratory of the Ontario Public Health Services division was officially opened when the Honourable Ray Connell, Minister of Public Works, presented the key of the building to Minister of Health Matthew B. Dymond. The Honourable H. Leslie Rowntree, Q.C., Minister of Financial and Commercial Affairs, acted as chairman.

The occasion marked a milestone in the 75-year history of the Ontario Public Health Services division as the new building is actually its first real home.

Established in 1890 to aid medical officers of health in maintaining community health — and practicing doctors in diagnosing infectious diseases — the laboratory was the first in Canada. Only two other services were ahead of it in North America — the U.S. Public Health Service set up in 1887 and the Massachusetts laboratory in 1889.

Today, Ontario has an integrated group of 19 public health laboratories located throughout the province, of which the Toronto Public Health Laboratory acts as the central reference and supply depot. The service examines more than two-million specimens every year, the great majority in the Toronto laboratory.

Since the Second World War the laboratory has been located in the old Christie Street Military Hospital, where a small section remains to distribute vaccines to health units in the province. The bacteriology, virology, biochemistry, serology and pathology divisions were moved during the year to the new building, which was largely newly equipped so that the work proceeded with minimum delay.

Toronto architects Wilson and Newton designed the building. The builder was McNamara Construction of Ontario Ltd., Toronto. It consists of a laboratory and auditorium wing joined by a section containing the main entrance. The floor area is about 174,600 square feet. Costs to build, equip and furnish as of March 31, 1967, were \$5,732,696.00.

## CLARKE INSTITUTE OF PSYCHIATRY OPENED BY PRIME MINISTER

The opening of the Clarke Institute of Psychiatry on May 18, 1966, represented the culmination of efforts of a great many people. The idea of such an Institute was first put forward by Dr. Charles Kirk Clarke, a pioneer of Canadian Psychiatry, in the early part of the century and the establishment of the Toronto Psychiatric Hospital some 40 years ago represented a move in this direction.

During the 40 years of its existence, the Toronto Psychiatric Hospital and the combined efforts of the Department of Psychiatry of the University of Toronto and the Mental Health Service of the Province of Ontario, have made many contributions to the development of education, research and service in the psychiatric field.

The Clarke Institute represents a further step in these developments and, coming into being as an individual organization under its own board of trustees, it has a unique opportunity to develop an exemplary psychiatric service in which research and educational efforts can be fostered.

The official opening took place in the auditorium where the Prime Minister of Ontario, the Honourable John P. Robarts, unveiled a plaque. Presentation of the key was made by Public Works Minister Ray Connell to Health Minister Matthew B. Dymond.

The Clarke Institute had been under construction since October, 1963. Pigott Construction Company of Toronto were the contractors. The result of their work is an impressive 14-storey tower and connected three-storey research wing — a far cry from the Toronto Psychiatric Hospital it replaces. The conception was by John B. Parkin Associates, Toronto architects, in collaboration with Department of Public Works staff. Costs amounted to \$9,510,183.00 at the close of the fiscal year.

# OUT-PATIENT SERVICE FOR THISTLETOWN HOSPITAL

Another, smaller, ceremony was held on March 1, 1967, when a new outpatient service at the Thistletown Children's Hospital in Etobicoke was inaugurated by Minister of Health Matthew B. Dymond following the presentation of the key of the building by Public Works Minister Ray Connell.

Tenders for the Centre were called in February, 1966, with the general trades contract going to West York Construction Co., Weston, who outbid eight other contractors for the job. The contract amount was \$98,400.00. With furnishings and equipment costs amounted to \$127,166.51 at the close of the fiscal year.



Day Care Centre, Ontario Hospital, Thistletown

It is a 72 by 50-foot building, single storey, slab on grade, of brick and concrete construction with plastic walls, acoustic tile ceilings, aluminum windows and doors, and tar felt and gravel roof.

Clinical teams, each consisting of a psychiatrist, psychologist and a social worker, will screen all potential patients for the hospital, diagnose emotional problems for children referred by schools, courts and other authorities and provide follow-up service for discharged patients.

# FIRST STAGE OF EXPANSION FINISHED AT PENETANGUISHENE HOSPITAL

Two new buildings have been completed at the Ontario Hospital, Penetanguishene, as the first stage in an expansion program which will eventually include a new Active Treatment building and the renovation of existing buildings.

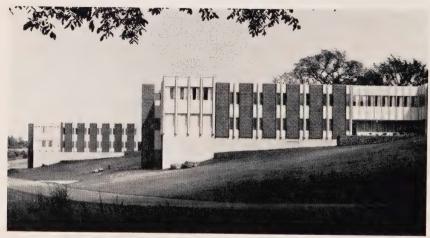


Overall view of the new Apartment-Type buildings, Ontario Hospital, Penetanguishene

The two new buildings are almost identical — one housing 100 male and the other 100 female patients. Architects for the project were Gilleland and Janiss, Toronto, who worked closely with the staffs of the Department of Public Works and Health in the design, interior decoration and selection of furniture and fixtures.

Dunker Construction Ltd., Kitchener contractors, were the builders at a contract price of \$1,281,555.00 awarded to them in June 1965. This was the lowest of seven bids.

Construction of the two buildings had reached the 60 per cent level at the close of the previous fiscal year. They were completed at the end of March



Another view showing both men's and women's residences



Front view of male patients' residence taken from the patio

1967 with the exception of some minor interior work and exterior work on grounds. Installation of furnishings and equipment was 99 per cent done. Costs at the end of the fiscal period reached \$1,460,426.31.



Main floor patients' patio



Main entrance lobby, upper floor



Lower floor nurses' station



Patients' lounge



Downstairs lobby with nurses station in background



Furniture grouping, main lobby



Patients' dining room

#### NEW POWER HOUSE WELL ADVANCED

The new powerhouse under construction at the Penetanguishene site is well advanced at 85 per cent, and a preliminary inspection of the interior of the building was held on March 30, 1967. The general trades contract for this work went to Dunker Construction Company Ltd., Kitchener, on May 13, 1966, for \$500,555.00. Work began May 16, 1966. The building is about 117 feet by 46 feet and centrally located to service both new and existing buildings on the grounds. Costs at the end of the fiscal period were \$477,764.03.

# TENDER CALL EXPECTED FOR ACTIVE TREATMENT BUILDING

Planning for the second-stage Active Treatment Building to accommodate 180 beds progressed to the point where tender call was expected late in 1967. This building will be used in conjunction with the existing building and the two recently completed Apartment-type buildings.

Facilities will provide for group treatment, physical therapy, minor surgery, X-ray treatment, dental care, the preparation and dispensing of medicines, laboratory diagnosis and the sterlizing and storage of equipment and supplies.

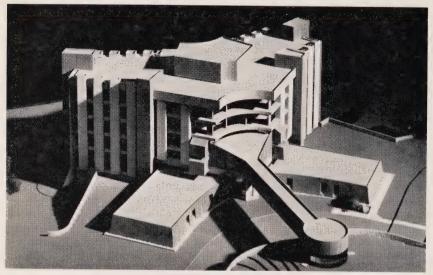
A "bonded storage" area of about 10,000 square feet will serve the entire hospital including the Criminally Insane section at Oak Ridges. There will be a separate room for the storage of inflammable material and volatile liquids, with explosion blow-out panel.

The plans show an enclosed, heated passage to connect the new building to the existing, in order to facilitate the movement of staff and patients. A completely equipped kitchen with walk-in refrigerators and freezers, and stainless steel fixtures will handle 900 meals at a time. This kitchen will serve both staff and patients of the entire hospital complex, including Oak Ridges. Food will be distributed to the other buildings by means of heated food trucks.

The building will be of contemporary design, finished in natural coloured, textured concrete with white, precast concrete vertical feature accents. It will be multi-storied to take advantage of the sloping site, and also to eliminate the long corridors that would have resulted in a one or two-storey building. The location will overlook the Bay, between the existing Administration Building and the Apartment Type buildings.

It will be served by two passenger elevators and one service elevator. A freight elevator and dumb-waiter will handle supplies from the receiving room to storage areas.

Because of the unusual nature of the ground water level in the area, all foundation walls and floor slabs below grade will be waterproofed with metallic waterproofing. Foundations, structural frame, floor and roof slabs will be reinforced concrete. Exterior walls will be precast concrete panels with concrete block on the interior. Interior partitions will generally be of light weight concrete blocks.



Artist's conception of the proposed Active Treatment Building, Ontario Hospital, Penetanguishene

The structure will be of fire-resistent construction and horizontal exits, dividing each floor into separate areas, are provided in accordance with the requirements of the Ontario Fire Marshal.

## FIRST-STAGE BUILDINGS COMPLETED AT LONDON

At the London Ontario Hospital grounds, work on the first-stage of the large reconstruction program had progressed from 72 per cent at the close of the previous fiscal year to essential completion. Some furniture had arrived and was being placed. Ellis-Don Ltd., London contractors, were the builders at a contract price of \$2,808,177.72. Other costs brought the expenditure to \$3,152,996.55 at the close of the fiscal year.



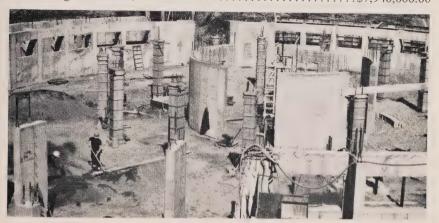
The completed first-stage construction, Ontario Hospital, London

First-stage buildings comprise a central five-storey medical wing with basement and mechanical penthouse flanked by single storey administration and occupational therapy wings, fronted by a lecture hall.

### CONTRACT FOR SECOND-STAGE BUILDINGS AWARDED

Tenders for the multi-million-dollar second-stage development were called in February, 1966, to close March 17, 1966. The bidding resulted as follows:

37 7 The blading tes	
FRID CONSTRUCTION COMPANY LTD., HAMILTON	\$7,387,000.00
Ellis-Don Limited, London	\$7,564,000,00
McDougall Limited, London	\$7,940,000,00



Concrete work on core construction for second stage, Ontario Hospital, London



Basement walls and columns, second-stage construction, Ontario Hospital, London

The low bid of Frid Construction Company was confirmed and approval for construction given in May 1966.

A description of the second-stage project was given in the previous year's Report. Primarily, the project consists of a north and a south pavilion, each two-storey with basement, and each having four wings for a total of 16 wards. The work also includes the continuation of corridors from the central core and demolition of several obsolete buildings on the site.

Construction is of reinforced concrete and brick, aluminum sash, and tar felt and gravel roof. Floors generally will be resilient tile and terrazzo, walls plaster, and the ceilings acoustical radiant heat. There will be four uses for the wings: admission floors, convalescent floors, geriatric floors and intermediate floors.

Second-stage construction began in May 1966 — the month of the award — and progressed to 44 per cent overall at the end of the fiscal year with 255 men on the project. The North Pavilion was closed in with interior work in progress. Expenditures were \$2,933,475.98. The Chapel was also renovated.

### PSYCHIATRIC HOSPITAL WELL ADVANCED AT PORCUPINE

The Northeastern Psychiatric Hospital at Porcupine is another large project under construction since December, 1964. Progress advanced from 55 per cent on March 31, 1966, to 92 per cent at the close of the present fiscal year. Plastering is completed throughout, application of special wall coating was close to completion and installation of resilient tile flooring continued in the Administration building and "A" and "B" wings. Preliminary inspections were slated for the Trades and Infirmary buildings.



Aerial view of Northeastern Psychiatric Hospital, Porcupine

The complex of cottage type buildings overlooks Lake Porcupine, near Timmins, and will accommodate 300 patients. The project has previously been described. McNamara Construction of Ontario Ltd., Toronto, are the contractors. Expenditures to March 31, 1967, totalled \$4,128,026,42.

### REGIONAL LABORATORY FOR PALMERSTON O.H.

A smaller project, a regional health laboratory at Palmerston, had reached a well advanced stage last year. This was completed in June 1966 with equipment received and installed and all furniture placed. Costs to construct, equip and furnish totalled \$51,411.80. G. &. J. Wintjes, West Hill, erected the building.

The building measures 50 by 37 feet and is single storey with no basement. Construction was of block with brick facing, wood-joist built-up roof and aluminum windows. A sanitary bacteriological laboratory with adjoining stockrooms comprise the main accommodation. It was erected immediately south of the existing powerhouse and trades buildings on the hospital grounds.

#### RENOVATION WORK AT EDGAR

Renovations and alterations to buildings at the former R.C.A.F. Station at Edgar were carried forward over the year. This work entailed an expenditure of \$320,236.96 to the end of March 1967. The Station will be utilized as an annex of Orillia Ontario Hospital for ambulatory cases of retarded children.

### ALTERATIONS AND ADDITIONS FOR WINDSOR LABORATORY

Tenders were called early in January 1967 for alterations and additions to the regional health laboratory at Windsor. The contract went to Woodall Construction Company Ltd., Windsor, early in February. The amount was \$227,500.00.

### TENDERS CALLED FOR MULTI-MILLION DRUG ADDICTION HEADQUARTERS

The establishment of a headquarters building for the Alcoholism and Drug Addiction Research Foundation has played a prominent role with the planners of the Departments of Health and Public Works over the past few years.

This came into sharper focus early in 1967 when Public Works called tenders for the project on March 23, 1967. Six major contracting firms submitted their bids which resulted as follows:

ROBERTSON YATES CORPORATION, HAMILTON	\$9,300,000.00
Ellis-Don Limited, London	
Pigott Construction Co. Ltd., Toronto	
Redfern Construction Co. Ltd., Toronto	\$9,947,000.00
Foundation Co. of Canada Ltd., Toronto	\$9,968,000.00
E. G. M. Cape & Company, Toronto	

Marani, Rounthwaite & Dick, Toronto architects, are associated on the project. The headquarters will consist of a four-storey main structure fronting on Russell Street to the north and contain a 100-bed hospital, extensive outpatients services, and the administrative and education headquarters; plus a seven-storey satellite structure, closer to Spadina Crescent, having research laboratories, a library, and the community service division.



Artist's conception of proposed headquarters building for Alcoholism and Drug Addiction Research Foundation, Toronto

The existing hydro sub-station has been integrated into the design as a whole, as have the facilities and areas shared with the adjoining Clarke Institute of Psychiatry.

The structure of the building will be reinforced concerete extending about 30 feet below grade to underground parking levels. Brick and precast concrete will comprise the exterior materials and this will be repeated in the walks and paved areas. Sun shading projections will appear at most windows, for privacy as well as for glare and heat control.

Plans provide for several private outdoor recreational areas through a judicious use of enclosed courtyards. Patients' rooms have been arranged in relatively small groups, and kept free of undue traffic from other areas.

Corridors are short, ceilings relatively low. Bright colours and acoustical treatments will be used to offset the usual institutional atmosphere. Service areas will be reached from underground parking ramps, leaving the ground level free of loading docks and truck yards.

As well as this, flexibility of use has been provided by using walls which can be removed, and areas which can be changed to accommodate the unforeseen developments of the future.

The actual shape of the building was developed from studies of the function and inter-relationship of the various areas taking into account the nature of the site. Its location is on the south end of the University of Toronto's west campus adjacent to the Clarke Institute of Psychiatry in the College-Spadina area.

The new Foundation headquarters will unquestionably be one of the most modern and complete centres in the world for the scientific study of all forms of addiction when it is completed.

It has been designed to embody a realistic balance in research, treatment and educational approaches to the control of addiction problems in our population. Its completion, expected some time in 1969, will mark the first time that the principal divisions of the Foundation have been able to operate as an integrated whole under one roof since its inception in 1949. These divisions are now separated by several city blocks.

The Alcoholism and Drug Addiction Research Foundation is an official agency of the province, financed largely by an annual government grant, and governed by a board of trustees appointed by the Lieutenant-Governor in Council.

In addition to its headquarters operations in central Toronto, the Foundation operates clinics and consultation centres in East Toronto, London, Ottawa, Hamilton, Fort William, Sudbury, Kingston, Windsor and Sault Ste. Marie.

Its threefold program of research, treatment and public and professional education is aimed at the reduction of addiction to alcohol and other drugs, which is considered a major public health problem involving more than 100,000 men and women.

General maintenance and renovation work was carried forward at the many Ontario Hospitals throughout the province.

# DEPARTMENT OF HIGHWAYS

Construction of buildings for the Department of Highways was confined to a Paint and Carpentry Shop at Kenora and a Bailey Bridge and Steel Fabricating Building in Toronto, the latter reported on the previous year. A Heated Storage Building at Fort William was nearing tender call and planning for a Central Stores Addition for Downsview was on the boards.

#### PAINT AND CARPENTRY SHOP BUILT AT KENORA

The contract for the Paint and Carpentry Shop at Kenora was awarded at the end of the previous fiscal year to E. R. Norman Ltd., Kenora contractors, for \$67,325.00. It was completed at the end of the calendar year.

The building is located near the existing divisional equipment garage and approximates 80 by 50 feet in size. Construction was of insulated metal fabrication on block foundations.

### BAILEY BRIDGE AND STEEL FABRICATING BUILDING COMPLETED

Construction of the Bailey Bridge and Steel Fabricating Building at Sheppard Avenue and Highway 400 in the Metropolitan Toronto area was essentially completed. It is located on existing Department of Highways property.



Bailey bridge and steel fabricating building, Shepherd Avenue and Highway 400, Metro Toronto

Lynch-Richards Construction Company, of Weston, erected the building at a contract price of \$232,100.00. It contains shops for steel bending and finishing, sand blasting, and has areas for storage, boiler room, two offices, washroom and lunchroom. It is built of concrete block with prestressed roof and deck. It will be used for repairs to Bailey Bridge sections and the fabrication of reinforcing steel.

### NEW TENDERING PROCEDURE INTRODUCED

Tender call for a Heated Storage Building at Fort William was issued at the turn of the fiscal year with tenders to close April 6, 1967. The tender call introduced an innovation in the tendering procedures of the Department. The tender advertisement for the Fort William building read:

"At the Ontario Department of Public Works Office, 20 Alberta Street, Port Arthur, Ontario, for the construction of the Department of Highways Heated Storage Building, Fort William, Ontario".

This was unusual. Until now all tender openings have been held in the Parliament Buildings in Toronto. The decision to depart from the usual practice was made by the Minister of Public Works and other officials following a detailed study primarily focussed on the difficulties experienced by general contractors in outlying areas when it came to bidding on projects tendered at Oueen's Park.

The decision to open tenders at Port Arthur was based on the opinion of Department officials that a decided advantage could be obtained by opening tenders in interested localities in that district contractors had a better chance to meet the due dates than would be the case by mailing through to Toronto.

The Fort William Building, containing 18 Vehicle bays will have overall dimensions of 326 feet by 42 feet, one storey in height. Construction will be of brick and block with steel joists and a precast concrete roof deck. Overhead garage doors and windows will be aluminum. The building will be located on existing Department of Highways property adjacent to the district garage at James Street and Mountain Avenue, north of Walsh Street.

#### TORONTO - DOWNSVIEW

Eight contractors bid for the general trades work in connection with the addition to the air conditioning and electrical work at the Central Stores Building, Downsview. Tenders for this project were opened February 16 with these results:

JAMES A. RICE LIMITED, RICHMOND HILL	.\$111,200.00
Kamrus Construction Ltd., Don Mills	
Ellwall & Sons Construction Ltd., Don Mills	
McAdam Construction Co. Ltd., Willowdale	
Wm. H. Johnston Construction Ltd., Toronto	
Grenville Construction Ltd., Toronto	
Ram Mechanical Construction Ltd., Weston	
Watts & Henderson Ltd., Rexdale	

The low bid by James A. Rice Limited was confirmed in March.

### DEPARTMENT OF LANDS AND FORESTS

The new District Office Building for Cochrane was the only building under construction for the Department of Lands and Forests during the year. Tender call for a Fish Hatchery Building at Balsam Creek, near North Bay, went out in January 1967 to close March 9, 1967. Details follow:

### OCCUPY NEW DISTRICT OFFICE BUILDING AT COCHRANE

Construction of the district office building at Cochrane by Ray St. Amour Construction Ltd., of Timmins, for \$194,500.00 began in November 1965 and had progressed to 15 per cent in March 1966. Construction advanced to the point where the building was occupied on February 23, 1967. Some interior work remained and was mostly finished at the conclusion of the fiscal year.

The office is located on Fourth Avenue, close to Third Avenue, in Cochrane. It is of masonry and steel construction comprising a semi-basement and first floor and has a 19-car parking lot at the rear. Ontario timber products were used wherever possible particularly in the entrance hall and foyer.

Housed in the semi-basement are a drafting room, meeting rooms, timber offices, a laboratory, lunchroom and mechanical room. Public and general offices, a research unit, forest protection and wildlife offices are on the first floor.

### FISH HATCHERY BUILDING FOR BALSAM CREEK (NORTH BAY)

Plans for a new Fish Hatchery Building for Balsam Creek (North Bay) reached fruition when tenders were called in late January, 1967, to close March 9, 1967. Four general contractors bid for the project which resulted as follows:

W. A. McDougall Limited, London	.\$343,700.00
Pillar Construction Limited, Ottawa	.\$350,000.00
Farquhar Construction Limited, North Bay	.\$362,642.00
Boulanger & Tremblay	
Construction & Supply Limited, North Bay	.\$382,500.00

Award of the contract was expected in April.

The new hatchery building will employ all the latest in modern techniques in the hatching and rearing of speckled trout. It will be located at Balsam Creek, about 20 miles north of North Bay on Highway 63.

The existing Balsam Creek Fish Hatchery has been in continuous operation since 1937, but its wooden buildings are outmoded and deteriorated and will be demolished.

The new facilities will play a large part in the restocking of the rivers and lakes in the North Bay and Sudbury areas and in the regions north of Algonquin Park which have important trout waters. It will also serve in relieving the congestion of work at the Sault Ste. Marie trout rearing station.

It is hoped that the fish in these areas, particularly speckled trout, will be doubled or tripled in population in the next few years. This means the region will lure many more thousands of sportsmen and tourists during the season with the consequent upsurge in the economy of this part of Ontario.

The location is well wooded and has lower and upper sites — the lower will contain the ponds for the retention of parent stock and culture fish with the upper containing the buildings and raceways for the rearing of young stock.

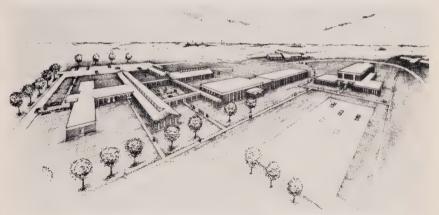
The new building will be a simple, functional structure, single storey, no basement, and constructed of concrete block with flat roof. It will house the hatching and rearing rooms, food preparation room, food storage, pellet food storage, workshop, garage, rooms for storage, boiler room, lunch and locker rooms, and public washrooms.

# DEPARTMENT OF REFORM INSTITUTIONS

### VANIER INSTITUTION FOR WOMEN AT BRAMPTON NEAR TENDER CALL

Planning for an Institution to replace the 87-year-old Mercer Reformatory for Women has occupied the attention of the planners of the Departments of Reform Institutions and Public Works for some time. The production of working drawings and specifications was intensified in the 1966-1967 period to the extent an advance notice of future tender call was advertised in January, 1967. A firm date was anticipated for June.

Construction of this correctional Institution, estimated to cost over \$3 million, is expected to begin in the summer of 1967 on a 30-acre site adjacent to the Ingleside Guidance Centre on McLaughlin Road South in Brampton. It will be known as the Vanier Institution for Women. Once completed, inmates of the Mercer Reformatory will be transferred to the Brampton Institute.



Artist's conception of the proposed Vanier Institution for Women, Brampton

Planned for two years, the design is by Public Works architects in association with Toronto architect Harry B. Kohl. The Institution will be of minimum security arranged in campus fashion on a widely landscaped site. There will be about 10 one-storey wings — some of them isolated and some connected by corridors. Capacity of the Vanier Institution will be 100.

The main sections will be for housing in cottage-type buildings, administration, medical treatment, education and other activities. Aside from a total floor area of about 100,000 square feet, there will be outdoor facilities for recreation. The institution is described as "open", there being no perimeter walls, fences or towers.

Security devices will be built into the structures themselves, including special windows and hardware facilities.

Construction will vary between poured-in-place concrete, precast concrete and masonry and brick. Facing will be mostly of brick and exposed concrete. Roofs will be precast, with structural steel for the lower spans. Some roofs will have pitched roofs.

Hot water heating will be installed in some groups of buildings with a central boiler, but cottages and other buildings will have individual heating.

Consulting engineers are: structural, John Maryon and Partners Ltd., mechanical and electrical, Rybka, Smith and Ginsler Ltd.

### ADDITIONAL CLASSROOMS FOR GALT TRAINING SCHOOL

A smaller project under construction will provide additional classrooms for the Girls' Training School at Galt. The general trades contract for this was awarded to Dunker Construction Company Ltd., of Kitchener, on September 16, 1966. The amount of the contract was \$170,886.25. Construction is well advanced with completion anticipated in June 1967.

A 60-bed dormitory and classrooms for the Burtch Industrial Farm was nearing tender call at the close of the year.



New classroom construction, Girls' Training School, Galt

# DEPARTMENT OF TOURISM AND INFORMATION

For the last few years the attention of planners of the Department of Tourism and Information and the Department of Public Works has primarily been focussed on the Centennial Centre of Science and Technology — the Province of Ontario's Centennial Project — although plans also include two reception centres to be established at Sault Ste. Marie and Windsor.

The Centennial Centre of Science and Technology was reported on in detail in the previous report. Tenders had been called to close February 23, 1966, with four major general contractors bidding for the job. The low tenderer was Pigott Construction Company Ltd., Toronto, whose bid of \$21,703,310.00 was confirmed in April 1966. Construction began in the month of the award.

Ontario's official Centennial project has since advanced to about 30 per cent completion with \$6,416,246.01 expended at the end of March, 1967.

Designed by architect Raymond Moriyama, the Centre consists of a cluster of buildings on a striking 180-acre site running into the Don Valley ravine just south of Eglinton Avenue and west of Don Mills in the Metropolitan Toronto area. The complex includes a reception building, the main building, and a structure embracing three exhibition halls and a collection area.

At the close of the fiscal year, plans were being made for dedication of the buildings on May 16, 1967, by H. R. H. Princess Alexandra, on the occasion of her visit to Toronto.

### TOURIST CENTRE FOR SAULT STE. MARIE

Tenders for a tourist reception centre at Sault Ste. Marie were called June 16, 1966. Four Sault Ste. Marie contractors bid for this project which went to George Stone & Sons Ltd., at a contract price of \$109,997.00 on August 16, 1966. Construction progressed through the year to 65 per cent.

The building is located on Huron Street near the point where U.S.A. visitors enter Ontario by the bridge and ferry. The centre is being built in

### THREE VIEWS OF BUILDING "A" CONSTRUCTION, CENTENNIAL CENTRE OF SCIENCE AND TECHNOLOGY, DON MILLS, TORONTO:



Looking northwest



Looking south



**Looking northeast** 

such a manner that it can be easily expanded as the need arises. It replaces the portable reception centre located at the entrance to the International Bridge connecting the two Soos.



Construction of the new Tourist Reception Centre, Sault Ste. Marie

### TENDERS CALLED FOR WINDSOR CENTRE

Tenders were also called for a new centre at Windsor. Tenders closed March 16, 1967. The low bid by A. Lombardo & Son Ltd., Windsor contractors, was expected to be confirmed the following month. Their bid was \$95,880.

Both of these reception centres are identical. They embody a new, modern design conceived by associate architects Lee, Robb, Elkin and Jung of Toronto. They are the forerunners of others to meet the needs of tourists.

The buildings achieve a maximum highway identity with a distinctive silhouette while a warm and vital atmosphere is created within through the extensive use of natural materials.

Both have long entrance decks and overhead canopies of laminated timber leading to central reception halls. Each has a modular reception counter with six reception stations flanked on one side and visitors' washrooms located on the other.

The entire areas will be brightened by natural light from rising skylit roof lanterns. Maps and posters will be mounted on the walls. Racks for display of travel literature will be behind the counters. A supervisor's office, staff facilities, service and utility rooms complete the facilities.

The buildings will be fully insulated and glazed with insulating glass. Heating is electric with mechanical exhaust systems providing ventilation. Ceilings are white acoustic tile and floors beige vinyl tile. Materials used combine warmth, economy and utility with natural and stained wood finishes predominating. Ample parking for both cars and trailers has been provided.

Approved for working drawings is a tourist reception centre for St. Catharines (Homer).

#### CIVIL ENGINEERING

HYDRAULIC SECTION
 DAMS, DOCKS, LOCKS, ETC.

#### **SUMMARY:**

The investigation, pre-engineering, construction, inspection and approval of the work on dams, docks, locks, etc., was done under the direction of the Hydraulic Engineer.

The regular maintenance of dams, docks, locks and navigable channels was carried out and repairs made where necessary. Removal of driftwood and obstructions from the dam sites was continued. Navigation routes and dangerous rocks and shoals were marked with buoys in the Muskoka and Magnetawan areas.

One concrete dam and reservoir, one concrete wharf and one timber dock, previously commenced, were completed; one concrete dam, previously started was carried forward; five concrete dams were started and completed this year; work on three concrete dams and one trout rearing station was begun. These projects are all detailed herein.

Pre-engineering and design work was carried out for projects scheduled for construction during the next fiscal year.

#### ABRAM'S CHUTE WALKWAY: Kenora District

Repairs were made to this walkway that parallels the chute between Minitaki and Abram Lakes near Sioux Lookout. The rough pole stringers that had spanned the spaces between the rock-filled cribs were replaced by laminated plank stringers and a new deck and handrail installed. Length of walkway repaired was approximately 400 feet.

# ARTHURS LAKE DAM: Mills Township, Parry Sound District

A new reinforced concrete dam was constructed this year across the Wolf River at the outlet of Arthurs (Jack's) Lake, to replace an old timber dam which had deteriorated beyond repair. The dam will maintain water levels on the lake for forest fire protection and will provide access for tourists to large portions of the lake which were previously inaccessible.



Arthurs Lake dam, Mills township, Parry Sound district, under construction

The new dam has two 14-foot sluice gates controlled by stoplogs and a 40-foot-long crest overflow wingwall. The overall length of the dam is 131 feet and the maximum height is 20 feet. The head of water maintained by the dam, measured from the sluiceway sill to the regulated water level, is 11 feet. Two pairs of stationary gear winches operate the stoplogs.

Concreting of the dam was finished this year. Final grading of earth fills, placement of stone rip-rap for protection of submerged slopes and land-scaping of the area around the dam will be carried out early next season.

### DREDGING AT BALA PARK: Medora and Wood Townships, Muskoka District

In the Fall of 1966, dredging of loose rock in Jeannette and Coulter Narrows, between Muskoka Lake and Bala Bay, was undertaken to improve the inflow to the system of Bala Dams and relieve flooding on Muskoka Lake. Approximately 400 cubic yards of rock were removed.

# PROVINCIAL FISH HATCHERY, BALSAM CREEK: French Township, Nipissing District

Work on the lower site at the above-noted hatchery began in January, 1967. Demolition of deteriorated hatchery buildings and facilities was carried out and construction commenced on a new reinforced concrete meter house and pump chamber. The completion of these facilities, together with construction of four earth ponds, two dams and related piping facilities will be carried out during the 1967-1968 fiscal year.

## BAPTISTE LAKE DAM: Herschel Township, Hastings County

Reconstruction of the dam at the outlet of Baptiste Lake was requested by the Department of Lands and Forests. Work started in April, 1966, and reconstruction was completed in December of that year.

The old dam had reached a stage where further deterioration would endanger the safety of the structure and complete construction was decided upon. The new dam was constructed immediately downstream of the existing



Baptiste Lake dam, Herschel township, Hastings County, before slide gate was installed

dam to make use of that structure as a cofferdam and as a means of controlling the level of Baptiste Lake during the reconstruction period.

The new dam is a reinforced concrete structure having four 14-foot-wide sluiceways, a 42-inch-square steel slide gate for close regulation of the outflow from the dam, and a 220-foot-long overflow wingwall. The dam averages 28 feet in height from the bottom of the foundation to the top of the deck and is 400 feet long. Timber stoplogs and moveable gear winches are used to control the outflow from the sluiceways. Upon completion of the structure, the old dam was removed to the extent that unimpeded flow through the new dam is obtained. A timber boom and concrete boom piers were provided upstream for safety purposes and to assist in driftwood handling.

### CACHE LAKE DAM: Canisbay Township, Nipissing District

The original dam at the outlet of Cache Lake in Algonquin Park was installed by lumbering interests at the close of the last century. After cessation of the logging operations, the dam was taken over by the Ontario Government, and in 1930 it was reconstructed with concrete by the Department of Public Works so as to maintain desirable water levels for aircraft and expanding tourist activities. This fiscal year, the dam was found to be deteriorated beyond repair and was reconstructed with reinforced concrete.

The new dam has one 14-foot sluiceway, a three-foot-square control valve and a 40-foot-long "OGEE" shaped overflow wall. Overall length of the structure is 80 feet, total height 12¼ feet. The head of water maintained by the dam, measured from the sluiceway sill, is eight feet.

The project was completed on October 21, 1966.

### CANOE LAKE WHARF: Peck Township, Nipissing District

The concrete portion of the wharf was completed last fiscal year. This year, building of an additional boat launching and parking area, grading of the earth fills and landscaping of the surrounding area was carried out and the project was brought to completion.

#### DENBIGH DAM: Denbigh Township, Lennox and Addington County

Work on this dam commenced this fiscal year. The existing deteriorated timber crib structure was removed and replaced by a reinforced concrete and earth fill dam.

The dam has one 14-foot sluiceway and is 29 feet high from bottom of foundation slab to deck and 154 feet long. The concrete deck and earth fill and concrete approaches serve as a roadway for vehicle traffic. The dam is equipped with fixed gear winches and timber stoplogs for regulation of the water level in Denbigh Lake.

In addition, a 78-foot-long by 10-foot-high concrete retaining wall was constructed along the south face of the existing mill building to support the freshly placed earth fills and avoid damage to the foundations of the building. Final grading and filling of the pond was carried out and the project completed on November 23, 1966.

### **DUNCAN LAKE DAM: Tyrrell Township, Timiskaming District**

Reconstruction of an old rock-filled crib lumberman's dam that had controlled the water level in Duncan Lake, on the west branch of the Montreal River, was requested by the Department of Lands and Forests in 1964.

Construction of an access road and erection of camp facilities was done during the last fiscal year. Excavation of the bypass channel was completed in May of 1966 and concreting of the main structure was carried out during the Summer and Fall. Concreting was completed on December 20, 1966.

The dam is a curved gravity, crest overflow structure with a single 14-foot gate controlled by timber stoplogs. Length of overflow wall is 218 feet; total length of the dam is about 330 feet. The head of water measured from the sluiceway sill to the regulated water level is seven feet and the operating deck is six feet above this level. Total height of the dam from the bottom of the foundation to the top of the operating deck is 20 feet.

Removal of the cofferdam, backfilling of the bypass channel and landscaping will be carried out early next season.

# DAM AND RESERVOIR AT EARL ROWE PROVINCIAL PARK: Tosorontio Township, Simcoe County

Finishing of the two bathing beaches and grading of the slopes of the reservoir was carried out this fiscal year. In addition, two timber pedestrian bridges were constructed to allow access from the beach areas to an artificially created island in the reservoir. Filling of the reservoir was carried out and completed in January, 1967.

### KAPIKOG LAKE DAM: Conger Township, Parry Sound District

Construction of a new dam between Kapikog and Healey Lakes was carried out this year to replace a timber dam which had deteriorated beyond repair. The dam will maintain water levels in Kapikog Lake to allow for a major new cottage development planned by the Department of Lands and Forests.

The new reinforced-concrete dam has a four-foot by three-foot cast-iron slide gate for regulation of water level and a 34-foot long crest overflow wall. The overall length of the dam is 69 feet, the maximum height 10 feet-six inches. The head of water maintained by the dam, measured from the bottom of the gate to the regulated water level, is six feet six inches.



A typical construction road through the bush. View of road into Kapikog Lake dam site, Conger township, Parry Sound district

Concreting was carried out in cold weather, under cover, and the heat and moisture required for curing of the concrete was supplied by a steam plant established on the site. Concrete work was brought to completion. Grading of earth fills and landscaping will be completed early next season.

### MAGNETAWAN DAMS AND LOCKS: Chapman Township, Parry Sound District

Widening and deepening of the inflow channel was proceeded with. Approximately 4,000 cubic yards of rock excavation was carried out this fiscal year.

### PORT SANDFIELD DOCKS: Medora Township, Muskoka District

Repairs were made to the timber wharves which provide docking facilities on both banks of the canal between Lakes Rosseau and Joseph at Port Sandfield. Timber stringers were renewed where required and 5,500 square feet of new three-inch timber floor was placed on the north wharf.

### RONDEAU PARK DOCK: Harwich Township, Kent County

Repairs were made to the timber dock at Rondeau Provincial Park which was constructed by this Department in 1965. Stringers were removed where required, 1,800 square feet of three-inch plank deck renewed and handrails and light posts repaired and adjusted.

### SOUTH BAYMOUTH DOCK: Tehkummah Township, Manitoulin District

The earth-filled approach embankment and 100 feet of the length of the timber dock were completed last fiscal year. This year, the remaining 110 feet of dock was completed which provides docking facilities during periods of low lake levels. Three floating docks were attached to a portion of the higher dock to facilitate docking of small boats and aircraft. A small building was located on the dock to permit the recording of water level and temperature data as well as house air compressors that protect the boats and dock by keeping them ice free during the winter. Fuel, water and electrical systems were also installed in the dock to service and maintain the fishing boats and aircraft.

The dock was completed and put in operation in July, 1966.



South Baymouth dock, Tehkummah township, Manitoulin district.

Department of Lands and Forests Fisheries Research Station

# THREECORNER LAKE DAM: Vrooman Township, Sudbury District

Reconstruction of the dam at the outlet of Threecorner Lake was requested by the Department of Lands and Forests in 1965. The original structure was a rock-filled timber crib dam built by lumbermen about 1916. Long out of use, the dam was badly rotted and failed during the heavy floods of 1960, allowing the lake level to drop about 15 feet.

Construction of an access road, camp and bypass facilities was done this fiscal year. Construction of the dam itself will be carried out next year.

# TURKEY POINT DOCK: Charlotteville Township, Norfolk County

Repairs were made to the timber dock at the Turkey Point Provincial Park which was constructed some time ago by the Dominion Government and later transferred to the Province. Renewal of stringers and deck planking was done, where required, for the safety of the general public.

# WAHWASHKESH (DEER) LAKE DAM: Burton Township, Parry Sound District

An access winter road was built to the dam site early in 1967 and the dam reinforced by placing a rock-filled berm along its downstream heel. In order to improve the flow in the river channel below the dam, remnants of an old pier were removed by blasting.

# WHITEFISH LAKE DAM: Lismore Township, Thunder Bay District

Reconstruction of Whitefish Lake Dam, requested by the Department of Lands and Forests in 1965, was carried out during the 1966 construction season. Located at the outlet of Whitefish Lake, this dam will allow close control of water levels to ensure successful wild rice harvest and excellent pickerel fishing.

Of reinforced concrete construction, the dam has three 14-foot sluice gates controlled by stoplogs and a stilling basin to control downstream channel erosion. Overall length of the structure is 89 feet and total height of the gated

section is 11 feet. The operating deck, 11 feet wide by 54 feet long is four feet above regulated water level. The head of water maintained by the dam, measured from sluiceway sill to regulated water level, is four feet.



Substantially completed Whitefish Lake dam, Lismore township,
Thunder Bay district

In conjunction with the construction of the dam, the channel of the Little Whitefish River was cleared of obstructions for a distance of about four miles downstream.

### CURRENT REPAIRS AND MINOR CONSTRUCTION WORK

Regular maintenance of dams, docks, locks and navigable channels was carried out and repair and minor construction work, including the overhauling of stoplogs, winches and painting of steel parts of structures was carried out where necessary. Repairs were made to the following dams: Blind River Dam, Algoma District; Gooseneck Lake Dam, Parry Sound District; High (Thessalon) Dam, Algoma District; Kashegaba Lake Dam, Parry Sound District; Magnetawan (South) Dam, Parry Sound District; Skeleton Lake Dam, Parry Sound District; Sydenham Dam, Frontenac County; Talon Lake Dam, Nipissing District; West Harry's Lake Dam, Nipissing District; White Lake Dam, Thunder Bay District; Wood Lake Dam, Muskoka District; Wren Lake Dam, Ontario County.

#### **GENERAL:**

Minor repairs, adjusting of winches, painting of steel parts, replacing of stoplogs, etc., were made to 49 dams not listed above. Timber protection booms and safety cables were repaired, replaced or adjusted where required. Driftwood and beaver dams were removed from 51 dams.

#### (B) WATER CONTROLS AND NAVIGATION AIDS

#### WATER LEVELS

Owing to the light snowfall during the 1965-66 Winter and temperatures being below average during the latter part of March and the first three weeks of April, 1966, the Spring runoff was easily handled without any serious flooding in the Muskoka and Parry Sound areas. However, the fall rains were exceptionally heavy, and in spite of all gates being open, natural channel obstructions caused some heavy flooding particularly along the Magnetawan River and chain of lakes. The discharge through the Bala dams at the outlet of the Muskoka system reached 11,400 cubic feet per second early in December. The normal summer flow is about 3,000 c.f.s. through the Bala dams.

#### **NAVIGATION AIDS**

All drum and spar buoys were cleaned and repainted during the period preceding the navigation season. They were placed in navigable channels and dangerous hazards as follows:

(a) Lakes Muskoka, Joseph, Rosseau and connecting channels:

Drum Buoys — 280 Spar Buoys — 90 Floating Beacons — 25

(b) Huntsville Lakes, Vernon, Fairy, Peninsular, Mary and connecting

Drum Buoys — 58 Spar Buoys — 6

(c) Lake Cecebe, Magnetawan River and Ahmic Lake:

Drum Buoys — 55 Spar Buoys — Nil

Ninety-four concrete anchors were constructed for buoys and used for replacements and new installations.

Extensive dredging was carried out on Lake Vernon at the mouth of the Big East River and will be completed during the next fiscal year. All important channels were kept clear of floating and submerged logs, debris, etc., and safety booms and cables were placed and maintained in front of all dams; painting of dam railings, winches, stoplog opening frames and covers was carried out at all dams and locks as required; landscaped dam and lock sites were maintained by pruning trees and bushes, cutting grass, etc.; warning signs as well as other public regulating signs were placed at required locations.

#### (C) LOCKAGES:

The records of watercraft which were passed through the three locks operated by this Department were as follows:

Port Carling Huntsville Magnetawan	   Boats over 30 ft. in length 1,750 Nil Nil	Small Boats 14,474 1,539 702	Scows Nil Nil Nil	Total 16,224 1,539 702
	1,750	16,715	Nil	18,465

#### REMEDIAL WORKS

GRANTS WERE PAID AS FOLLOWS:

ORANIS WERE TAID AS TOLLOWS.	
Town of Elmira (Waterloo) Flood Relief	\$ 7,000.00
Town of Elmira (Waterloo) Flood Relief	8,423.72
White River Improvement District (Algoma) — Flood Relief	9,680.12
Chatham (Kent) St. Joseph's Hospital Shore Protection	39,529.31
Total	\$64.622.15

#### MUNICIPAL DRAINAGE

THREE GRANTS WERE PAID TO MUNICIPALITIES AS FOLLOWS:

Township of Alice and Fraser (Renfrew).  Township of Armour (Parry Sound).  Township of Scugog (Ontario).	383.00 300.00 294.36
Total	\$ 057.36

### **ROADS SECTION**

#### **SUMMARY:**

The Roads Section completed the pre-engineering on a large number of requests for new roadways, parking lots and reconstruction of old roads at various government establishments throughout the Province. Of the 50 jobs completed, ten were for the Department of Lands and Forests, including a new road to the Fish Hatchery at Normandale, and the planning of the new roadways for the development of Kakabeka Falls Park.

The Driver Test area at Downsview was redesigned for the Department of Transport to meet modern demands and to allow for off-street testing of new driver applicants. This section also gave assistance in the design or redesign of roads, parking lots, sidewalks, etc., for new buildings.

#### SANITARY ENGINEERING

Throughout the past fiscal year, all of the existing sanitary installations which consist of waterworks systems, sanitary and storm sewers, sewage treatment plants, pumping stations, elevated water tanks, etc., at all hospitals, schools and other institutions in the Province, were maintained in good operating condition.

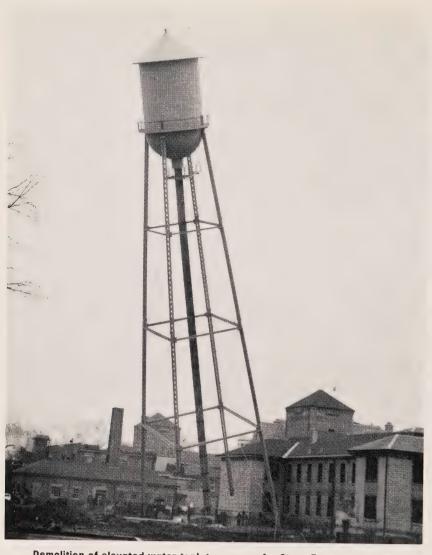
Six elevated steel water tanks were cleaned and repainted at the following locations: Ontario Hospitals at North Bay, Orillia, Goderich, Brockville and St. Thomas, and for the first time since its erection in 1963, the tank at the Southern Research Station, Maple. Emergency repairs were carried out on two occasions during the year on the elevated wood stave tank at the Ontario Fire College, Gravenhurst. The elevated steel water tank at the Ontario Hospital, London, was dismantled to make way for the new construction to be carried out under Stage Two.

Large deep wells are employed for the supply of water to the Ontario Hospital, North Bay; Southern Research Station, Maple, and the Ontario Reformatory, Millbrook, and in each case the two deep well turbine pumps were removed, one at a time, carefully examined, reconditioned and new parts incorporated where necessary as a result of wear. The units were then re-installed and placed in service. There are two domestic cold water service pumping units with turbine pumps installed at both the Ontario Hospital, North Bay, and the Ontario Reformatory, Millbrook, and these were also completely reconditioned and re-installed.

Adequate outside services were provided to suit the respective requirements for all new building projects. The following sanitary engineering projects were completed during the year:

#### **DEPARTMENT OF AGRICULTURE**

At the Agricultural Research Institute, Experimental Farm, Elora, the first phase in the provision of farm drainage was completed. This work is part of a five-year program toward the development of this Experimental Farm. The contract for this work included the installation of 127,000 lineal feet of four-inch farm tile: 250 lineal feet of five-inch header, 3,000 lineal feet of six-inch



Demolition of elevated water tank to prepare for Stage Two construction, Ontario Hospital, London

header, 2,200 lineal feet of eight-inch header and 1,600 lineal feet of 12-inch header, together with the necessary outlets, and this installation was made on parts of the Worton and Campbell farms.

To provide irrigation to the north section of the **Horticultural Experimental Station at Simcoe**, a system of eight-inch asbestos cement underground mains was installed with 10 outlet manholes. From these outlets, aluminum pipe is laid overland to the various plots to be irrigated which is accomplished by a suitable number of sprinklers. The irrigation water is pumped by means of a gasoline engine driven 400 gallon per minute pump from a man-made pond, fed by springs.

At the Horticultural Experimental Station, Vineland, the existing old, corroded and leaking domestic water distribution system, which consisted of two-inch diameter galvanized iron pipe was replaced completely with four-inch cast iron mains. New domestic water service connections to all the buildings were also provided.

During the construction of the overpass and cloverleaf on the Queen Elizabeth Highway at Victoria Avenue by the Ontario Department of Highways, the Horticultural Experimental Station, Vineland, eight-inch cast iron irrigation main was re-located to suit the new conditions. This main was installed two years ago to provide irrigation to lands on the south side of the highway, at which time the construction of the overpass had not been considered.

#### DEPARTMENT OF ATTORNEY GENERAL

The sanitary sewage disposal field was completely reconstructed at Hudson and Central Patricia Ontario Provincial Police Detachments.

#### DEPARTMENT OF EDUCATION

The western portion of the front lawn at the **Teachers' College, Port Arthur,** proved to be swampy and a satisfactory lawn could not be established. To correct this, underdrains were provided and a header constructed to the storm sewer. Topsoil was added, graded and the whole area seeded. The contract for this work also included the installation of lawn watering lines which were of plastic pipe. Five outlets on these lines were provided and the connection to supply the water was made from the domestic water service in the building behind the water meter: sediment trap was installed on the water service in the basement ahead of the meter.

#### DEPARTMENT OF HEALTH

At the Ontario Hospital, Goderich, a problem in water supply was experienced due to the water freezing in the bottom portion of the elevated steel water tank standpipe. An investigation revealed that this was due to lack of adequate movement of water during the winter months when the demand was relatively low, principally during the night period. To rectify this, a different type of altitude valve was installed which functioned satisfactorily last winter. A water level indicator and recorder was also installed. This instrument was located in the Power House for the convenience of the operating staff. It provides a continuous record of the variation of the water level in the elevated water tank. An alarm system, in conjunction with the instrument, was provided so that the operator in the Power House may take corrective steps should the water level in the elevated tank fall to a critical point.

A considerable area of flooding, especially in the spring of each year, had been experienced at the hospital, in the area used for a playing field. Minor flooding had also taken place on the main entrance road. By re-grading, sodding, etc., the main interceptor ditch, and the installation of a suitable culvert and drainage for the road, this problem was eliminated.

At the Ontario Hospital, Gravenhurst, a new sanitary sewage collector system was provided to convey all domestic wastes from the south-west section of the Hospital to the new sewage treatment plant. The system consists of six-inch and eight-inch gravity sewers, a sewage lift station of 100 gallons per minute capacity and 650 lineal feet of four-inch diameter polyethelene force main. The system will serve the former Nurses' residence, which is to be converted to receive patients, and will permit the elimination of the existing septic tank and inadequate disposal field. The new system replaces the deteriorated 30-year-old sewers that formerly served the Barbara Heyden Building and three large staff residences where frequent blockages occurred.

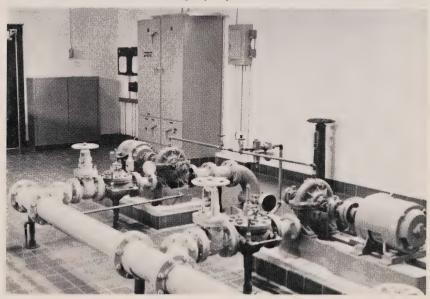
At the Ontario Hospital, Kingston, the original water supply source was Lake Ontario prior to the installation of an eight-inch and a six-inch service from the city main on King Street. The Lake intake, two steam-driven pumps, an electric motor driven fire pump and a large chlorinator, were retained for stand-by service. In view of the increased contamination of the lake water, it is no longer possible to consider introducing the lake water into the hospital system. As a result, the above-mentioned pumps and chlorinator have been removed and the pipe interconnection between the lake supply and the hospital distribution system eliminated.

The old narrow obsolete bridge across the Thames River, adjacent to the Psychiatric Research Institute, London (formerly Byron), was demolished

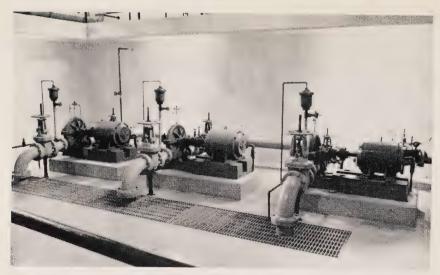


Exterior view of Water Treatment Plant and Booster Pumping Station, Ontario Hospital, London

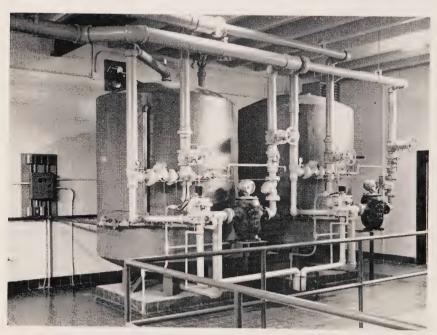
and replaced by a modern structure. The old bridge carried the watermain across the river and this main supplied the institute. The City of London decided to abandon the watermain connection across the river and prior to the removal of the old bridge, constructed an addition to their system of mains on Sanitorium Road and Riverside Drive. An eight-inch water service connection was made to this new 12-inch City main on Sanitorium Road and carried into the institute property where a new reinforced-concrete



The low lift pumps showing electrical control panel, Water Treatment Plant and Booster Pumping Station, Ontario Hospital, London



The high lift pumps, Water Treatment Plant and Booster Pumping Station, Ontario Hospital, London



The softening units, Water Treatment Plant and Booster Pumping Station, Ontario Hospital, London

meter chamber was provided. A new suitable water meter was installed in the chamber with relative piping and valves. A connection from the meter chamber to the institute water distribution system was made to suit the new conditions.

At the Ontario Hospital, London, Stage One of the reconstruction was completed and Stage Two was begun last June. This stage included the complete reconstruction of all the storm and sanitary sewer systems. These are now complete except for the trunk storm sewer which is presently advertised for the calling of tenders. During the year, the waterworks system, including the booster pumping station and water softening plant, etc., was completed and placed in operation.

The water supply for the **Ontario Hospital**, **North Bay**, derives from two deep wells located on the hospital property. The water produced by these wells is discharged into a large concrete reservoir and then introduced into the hospital distribution system of mains by the booster pumping station. It was observed that the concrete in the reservoir was disintegrating and, upon further investigation, it was found this was due to the corrosive characteristics of the water. To correct the deterioration and to prevent further action of the water on the concrete, the reservoir was emptied, cleaned and the walls parged with cement plaster; a floor topping of sand and cement was also applied. Both floor and walls were then painted with a special anticorrosive paint.

At the Ontario Hospital, Whitby, the trunk sanitary and storm sewers were originally constructed parallel and in the same trench with combined manholes. In the past, this situation caused a problem when the sanitary sewer became blocked and, upstream at an adjacent manhole, the sewage would flow over the weir into the storm sewer, thence to the lake. To ensure that all sanitary wastes would be received in the treatment plant, 26 standard type separate manholes were constructed on the two trunk sewers, 13 on each, and the manholes were staggered with the existing combined manholes which were then demolished. Some sections of the existing trunk sewers were reconstructed as necessary.

The installation of the new water supply main from the City of Woodstock mains to the Ontario Hospital, mentioned in the previous annual report, was finished early in the year and placed in service. On completion of this installation, a survey of the hospital water distribution system was carried out and a contract let for the necessary rehabilitation. This work included the replacement of 16 old, inoperable isolating valves with new gate valves and valve boxes. A second eight-inch cast iron watermain was constructed from the mains of the Epileptic Section on the west side of Highway 59, across

the highway and connected into the system of mains serving the Tuberculosis Section on the east side. This was necessary to assure an uninterrupted supply of water, to improve fire capability and to provide a more flexible system.

The 10-inch trunk sanitary sewer serving the Tuberculosis Hospital, crosses Highway 59 and discharges into the sewage lift station adjacent to the Power House on the west side of the highway. Due to the construction of the new highway bridge crossing the Thames River, and the necessary re-alignment of the highway north of the bridge, it was necessary to reconstruct the section of the trunk sewer crossing to suit the new highway location and grade. This was carried out without interruption to service.

#### **DEPARTMENT OF HIGHWAYS**

A new sanitary sewage disposal bed was constructed at the Lambeth patrol garage to replace the existing one which, due to its age, had ceased to function.

#### **DEPARTMENT OF LANDS AND FORESTS**

In previous years, the water supply at **Darlington Provincial Park** was provided by three small production deep wells, which were inadequate. The first stage of providing adequate water at the Park was completed last year with the installation of the eight-inch cast iron main from the Oshawa water system to the Park. The second stage was completed this year: i.e., a water distribution system throughout the whole Park, adequate enough to supply the requirements of all campers, visitors, etc. This system consists of eight-inch, six-inch and four-inch watermains with service connections for comfort stations, picnic areas, offices, staff houses, etc., together with fire hydrants for the protection of the permanent buildings.

The existing water filtration plant at the **Geraldton Air Base** was renovated. The filter media was removed and replaced and the whole system completely rehabilitated and brought up to a satisfactory operating level. A new additional domestic water supply pumping unit was also provided and installed as a stand-by unit, in case of emergency.

At Chutes Provincial Park, Massey, the first phase of the water distribution system was completed: i.e., in the portion of the Park west of the Sable River. The water is supplied from the Village of Massey waterworks system. The installation was completed and operative just prior to the July 1st week-end. The system consists of 1,475 lineal feet of six-inch and 2,700 lineal feet of four-inch watermains. The system was constructed for summer use only and will be flushed out and drained every fall, at the end of the tourist season. To this end, an air injection station was provided and an air relief station

together with four hydrants for flushing. The permanent buildings on the west side of the Park that are used all year round, are provided with continuous water service and this was accomplished by isolating this portion of the system from the Park portion. A fire hydrant was provided for fire protection.

At Sibbald Point Provincial Park, near Sutton, the existing water supply is by means of a combination of small deep wells and small diameter lake intakes. This system has proven unsatisfactory and inadequate due to the high influx of people on summer week-ends; therefore a new water supply system with a single source of supply was indicated and has been planned. In view of the high water requirements, the lake was, of necessity, selected as the source of supply. The construction of the intake which is eight-inch diameter, was completed during the winter. This intake was carried out 1,500 feet from the shore to secure a depth of 20 feet. This was necessary in order to procure clean water which would be unaffected by the turbulence. during storms experienced closer to shore in the more shallow water. At the shore end of the intake, a 10-inch well casing was installed to an adequate depth and the eight-inch intake connected to it. Next year a submersible pump will be installed in the casing and will discharge to an underground concrete water reservoir to be provided. A booster pumping station will also be constructed and provided with suitably sized pumping units together with the necessary water distribution system.

The final stage in the development of Wheatley Provincial Park on Lake Erie was completed last September and placed in operation. This phase of the work consisted of the installation of 11,000 lineal feet of four-inch polyethelene sanitary sewage force main, 1,400 lineal feet of six-inch diameter asbestos cement gravity sewers, eight sewage lift stations and a 2.7 acre sewage lagoon with all necessary appurtenances including a watchman type fence. The sewerage system was designed to provide complete sewage collection and approved treatment for all the various comfort stations, camping sites and permanent buildings. A maximum of 25,000 visitors per day can be provided with the necessary sanitary services and water requirements.

#### **DEPARTMENT OF REFORM INSTITUTIONS**

The existing trunk sanitary sewer at the **Burtch Industrial Farm**, due to deterioration, was permitting an unduly heavy infiltration of ground water. This condition caused a problem of overloading in the sewage treatment plant and had to be rectified. This trunk sewer was completely reconstructed from the building area to the treatment plant, a distance of 1,380 lineal feet. The eight old, existing brick manholes were also replaced with standard reinforced concrete manholes. Several lateral sewers from buildings were also

renewed. A water meter and by-pass was installed at the Cannery on the water service so that the contribution of this industry to the sewage treatment plant could be ascertained regularly as necessary.

Operational difficulties had been experienced with the mechanical sewage treatment plant serving the **District Jail at Kenora.** The condition was noted to be aggravated during the winter periods when, due to temperatures which dipped frequently to as low as minus 40°F, icing occurred to such an extent that the treatment of the sewage was most unsatisfactory. In view of this, it was decided to convert the plant to a diffused air type which was carried out and completed in mid-December last, just before the cold winter weather set in. The performance of the converted plant was carefully observed during the balance of the winter and found to be entirely satisfactory.

At the **Ontario Reformatory**, **Millbrook**, a six-foot high watchman type fence was constructed around the industrial wastes lagoon in order to comply with the safety requirements. The fence consists of 425 lineal feet of fencing with a double gate provided with a locking device.

#### WELL DRILLING

During the year, 33 new deep wells were drilled and brought into production at various locations throughout the province. These wells varied in capacity from five to 35 imperial gallons per minute and in each case a suitable automatic pressure system was supplied and installed to provide domestic water supply. A large percentage of these wells were drilled for various Department of Lands and Forests Provincial Parks, six of these wells being located in the Arrowhead Lake Park just north of Huntsville. In addition, a program of extensive test drilling was carried out at Earl Rowe Park, near Alliston, with good results. Test drilling was carried out at the Adult Education Centre, Edgar, and a water source located on the property, adequate to supply the domestic water requirements.

Next year, twin wells will be completed close together at this location, twin pumps installed, a pumphouse constructed and a connection made to the supply main leading to the reservoir. Test drilling was also carried out at two proposed building sites but was, in each case, unsuccessful. At Sibbald Park, Canoe Lake in Algonquin Park and at Department of Reforms Portage Lake Camp, a well casing was put down to receive water from an intake to be constructed in each respective lake for a water supply.

#### **SURVEYS**

A complete site survey was carried out at the Youth Leadership Training Centre at Irondale from which detailed site plans were prepared, showing all buildings, roads, walks, fences, together with all the existing underground services.

A complete re-survey was carried out at the Boys' Training School, Bow-manville, and the site plan drawings revised accordingly. At the Ontario Hospital, London, a re-survey of the portion of the hospital which had been involved by the construction of Stage One was also carried out and all deviations between the design drawings and as actually constructed, were shown on the site plans.

#### **BOILER INSPECTION**

The boiler inspection work of this Department was carried out under the supervision of officers of the Ontario Department of Public Works.

The boilers, boiler plant and heating equipment of the legislative and and departmental buildings, Osgoode Hall, educational buildings, agricultural buildings, district buildings, Ontario Government Hospitals, Ontario Training Schools and Ontario Reformatories were inspected and reported upon for safety and proper operation and to determine the extent of the repairs and material needed for such repairs as to properly maintain and operate the power and heating plants in the various building groups. In the case of the Ontario Hospitals and Reformatories, the reports were sent to the Departments of Health and Reform Institutions, for their attention in the matter of making minor repairs recommended. Major repairs for these departments were attended to by the Department of Public Works.

#### **ONTARIO GOVERNMENT EXHIBITS**

Public Works provided space, stage, and services; and co-ordinated the displays of exhibiting departments into consolidated Ontario Government Exhibitions in participation with the — Canadian National Exhibition in Toronto; the Central Canada Exhibition in Ottawa; and the Western Fair at London.

The Canadian National Exhibition was held in Toronto from August 19 to September 5, 1966, and the Ontario Building housed the Government Exhibits. Concurrently, preliminary study was being given to plans for a special production in the 1967 Centennial Year, therefore no major renovations or preparations were made in the Ontario Building for the 1966 Exhibition. Some of the existing exhibits were re-vamped. Essential services were supplied and maintained, including electrical and mechanical distribution, equipment, and general repairs.

The Department of Public Works maintained close liaison with the exhibiting departments during the year. Government exhibits shown were from the Departments of Agriculture, Attorney General, Ontario Provincial Police, Financial and Commercial Affairs, Fire Marshal, Civil Service Commission, Economics and Development, Education, Energy and Resources Management, Health, Highways, Labour, Lands and Forests, Mines, Municipal Affairs, Ontario Hospital Services Commission, Ontario Northland Railway, Ontario Water Resources Commission, Provincial Secretary and Citizenship, Reform Institutions, Tourism and Information, Provincial Archivist, Transport and University Affairs.

The Central Canada Exhibition was held in Ottawa from August 19 to August 27, 1966. Exhibits of the Ontario Government were shown in the McElroy Building at Lansdowne Park with Public Works personnel from its District Office at Kemptville, supplying services to the exhibit area. Exhibiting were the Departments of Agriculture, Economics and Development, Education, Fire Marshal, Health, Highways, Labour, Lands and Forests, Reform Institutions, Transport and Water Resources.

The Western Fair was held in London from September 9 to September 17, 1966. Governmental departments exhibited in the Special Events Building at "Queen's Park". Planning, allocation of space, maintenance and supervision of exhibits were under the supervision of the Department of Public Works. Exhibiting were the Departments of Agriculture, Economics and Development, Education, Fire Marshal, Health, Highways, Labour, Lands and Forests, Reform Institutions, Transport, Water Resources, and Ontario Hospital Services Commission.



#### **ACCOUNTS BRANCH**

Responsible for the financial affairs of the department, this branch is composed of four sections.

The General Accounts section receives, processes and records all documents directly concerned with the ordinary expenditures of the department as well as capital disbursements, capital receipts and ordinary revenue.

A constant check on the department's budget as it is related to works programs is maintained by the Budget Section. Records of capital assets, internal auditing, and a variety of statistical work are also responsibilities of this section.

Payroll administers the payrolls of both the regular staff and casual day-labour tradesmen.

Stores Accounting is in charge of costing stores operations involving construction materials, equipment and supplies. Records are kept of cost-recoverable materials which are chargeable to other government departments or Crown agencies.

### REPORT OF THE ACCOUNTS BRANCH

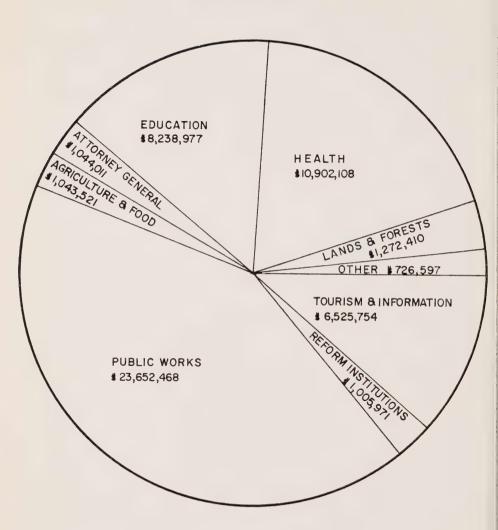
The following statements cover the expenditures and receipts of the Department of Public Works for the fiscal year ending March 31, 1967.

A comparison with the budgeted figure reveals an over-expenditure of \$7.4 millions. Of this amount, \$1.4 millions were in connection with Ordinary Expenditure and \$6.0 millions in connection with Capital Disbursements. Salary increases granted to clerical, professional and caretaking staffs accounted for nearly \$750,000.00 of the Ordinary. Greater use of agency help due to difficulties in recruitement and the expansion of programs resulted in an expenditure of \$80,000.00 in Main Office, Maintenance, and contributed to the over-expenditure of \$94,000.00 in this item. Acquisition of new leases to accommodate government services added \$153,000.00 to the budget. The over-run of \$780,000.00 on Repairs to Buildings reflects the increased cost of maintaining government-owned buildings and the large carry-over of work from the previous year (\$750,000.00). Offsetting these increases were unused funds amounting to \$400,000.00: a surplus in Jail Grants of \$220,000.00 and a cutback in the plans for the Canadian National Exhibition, \$180,000.00.

Property purchases were up \$1.0 million from the previous year to a value of \$7.6 millions, while anticipated federal grants were down \$1.0 million. This would appear to be major causes of the request for additional funds in Public Buildings, Construction. In addition salary increases granted the clerical and professional classes accounts for \$100,000.00. The overexpenditure in Dams, Docks, etc., was due mainly to the increase in the wage bill, bringing the wages to parity those in the Civil Service.

### ONTARIO DEPARTMENT OF PUBLIC WORK

# CAPITAL EXPENDITURES 1966-67



NEW CONSTRUCTION and CAPITAL IMPROVEMENTS \$54,411,817 (GROSS)

### REPORT OF THE ACCOUNTANT

The following figures show an increase in the net operations of the Department from the previous year. However, gross disbursements, excluding Federal grants of \$3,196,324.26 in 1966-67 and \$9,147,444.41 in 1965-66 reveal an increase in Capital Disbursements of only \$5,391,593.93 (12.02%) and in total expenditure \$7,681,361.80 (12.85%).

#### **EXPENDITURES**

Fiscal Year	Ordinary	Capital	Total
1966-67 1965-66		\$47,035,836.42 35,693,122.34	
Percent Increase	\$ 2,289,767.87 15.32%	\$11,342,714.08 31.77%	\$13,632,481.95 26.92%

### SUMMARY OF EXPENDITURES For Fiscal Year April, 1966 to March 31, 1967

Service	Ordinary	Capital	Total
Main Office —		Ŷ	
Administration expenses, etc.	\$ 1,608,619.56		\$ 1,608,619.56
Maintenance and Repairs —			\$ 1,000,019.30
Government Buildings	10,983,092.42		10,983,092.42
Leased Premises — Rentals, etc.	4,303,326.00		4,303,326.00
Public Works — Dams,	4,303,320.00		4,303,320.00
Docks, Locks, etc.	124,983.00	\$ 1,239,499.68	1,364,482.68
Public Buildings and Services		45,796,336.74	45,796,336.74
Miscellaneous	214,356.67	45,790,550.74	214,356.67
	\$17,234,377.65	\$47,035,836.42	\$64,270,214.07

#### STATEMENT OF REVENUE

Commissions on Telephones	\$	8,853.07	\$		S	8,853.07
Sale of Materials		35,268.83	_	35,245.05	_	70,513.88
Rentals		1,373,551.14				1,373,551.14
Perquisites		2,101.75				2,101.75
Building Equipment		2,020.40				2,020.40
Miscellaneous		7,627.03				7,627.03
Sale of Property				131,097.33		131,097.33
Plan and Contract						
Security Deposits				15,740.00		15,740.00
	-				-	
	\$	1,429,422.22	\$	182,082.38	\$	1,611,504.60

#### STATEMENT OF

### EXPENDITURES, MAIN OFFICE MAINTENANCE REPAIRS AND CONSTRUCTION OF PUBLIC BUILDINGS

For Fiscal Year Ending March 31, 1967

#### ORDINARY

Sarvica

Service	Amount	Amount
MAIN OFFICE		
Minister's Salary	\$ 12,000.00	
Salaries	1,132,339.92	
Travelling Expenses	11,492.50	
Maintenance	240,905.98	
Insurance	41,211.73	
Contingencies	28.95	
Workmen's Compensation Board, Awards and Costs, etc	126 000 75	
Unemployment Insurance	126,889.75 43,750.73	
and the state of t	45,750.75	\$ 1,608,619.56
		\$ 1,000,019.50
ONTARIO GOVERNMENT BUILDINGS		
Operational Maintenance Salaries —		
Maintenance Staff		
Maintenance — Fuel, electricity, etc	1,326,926.35	0.5.170.001.70
		\$ 5,179,234.73
ONTARIO GOVERNMENT BUILDINGS		
Repairs to Buildings and Services, etc		\$ 4,136,290.67
Telephone Communication Services —		+ 1,100,270101
Administration of Services and Rental of		
Equipment		\$ 1,667,567.02
LEASED PREMISES		
Rentals and Expenses		\$ 4,303,326.00
		\$ 4,303,320.00
MAINTENANCE OF LOCKS, BRIDGES,		
DAMS AND DOCKS, ETC.		
Maintenance		124,983.00
MISCELLANEOUS		
Production of a unified Ontario Centennial		
Exhibit in the Ontario Government		
Building, Canadian National Exhibition,		
	\$ 68,644.75	
	+ 00,011175	
Preparing and installing exhibits for Govern-		
ment Departments, including costs of electrical services and other expenses in		
connection therewith	36 240 00	
competion therewith	36,240.09	

Service	Amount	Amount
To provide for Grants towards the cost of construction of New Jail accommodation as may be directed by the Lieutenant Governor in Council	32,745.09	
Dredging — Muskoka Dredging in the Muskoka Lakes	11,116.23	
Aid — Remedial Works, etc. — Grants to provide for purchase of lands, construction of remedial works, to alleviate flooding conditions, erosion of farm lands and other damages and expenses in connection therewith as may be directed by the Lieutenant-Governor in		
Council	\$ 64,633.15	
Municipal Drainage, including grants in aid thereof	977.36	\$ 214,356.67
TOTAL ORDINARY EXPENDITURE		\$17,234,377.65
CAPITAL DISBURSE	MENTS	
ARCHITECTURAL AND ENGINEERING		
Salaries Travelling Expenses Maintenance	\$ 1,783,141.01 92,906.02 64,537.93	£ 1.040.594.07
PURCHASING		\$ 1,940,584.96
Salaries Travelling Expenses Maintenance. Construction Machinery and Equipment	362,500.71 8,063.83 4,136.55 102,288.65	
PROPERTY AND SURVEYS		\$ 476,989.74
Salaries. Travelling Expenses. Maintenance.	459,472.23 57,822.07 39,719.95	\$ 557,014.25
PUBLIC BUILDINGS AND SERVICES		Ψ 337,01 <del>4</del> .23
To provide for the construction of new buildings and works, purchase of lands and buildings, alterations equipment and extension of services to existing buildings and works and the purchase of materials		
for stores and expenses in connection therewith		

Service	Amount	Amount
DAMS, DOCKS AND LOCKS Construction of Dams, Docks and Locks Salaries. Travelling Expenses. Maintenance Construction.	163,917.70 25,835.58 1,935.62 1,047,810.78	\$ 1,239,499.68
		\$47,035,836.42
SUMMARY		
ORDINARY EXPENDITURE  Main Office, Maintenance and Repairs of Government Buildings, etc		\$17,234,377.65
CAPITAL DISBURSEMENTS Public Buildings and Public Works		\$47,035,836.42
		\$64,270,214.07

#### **REAL ESTATE BRANCH**

The four sections of this branch fulfil a very important function. Property is responsible for the necessary investigation, evaluation and negotiation required for the purchase or disposal of Real property. It also administers the large leasing program to provide premises for the expanding government program. An administration section records payments of leases and revenues received from government-owned properties. Records of taxes and fire insurance payments are also kept by this section.

The Office Accommodation section maintains an inventory of all office and related space which the Ontario Government owns or leases in the province. It recommends the most essential moves between departments which are expanding or consolidating from widely dispersed locations. This section is now engaged in a study for recommendations on occupancy of the Queen's Park Office Development Program. It also administers civil servants' and public car parking at various locations in Metropolitan Toronto.

Land Surveys has the responsibility for all land surveys necessary in the acquisition, leasing or disposal of property throughout the province.

### REPORT OF THE REAL ESTATE BRANCH

This year, the activities of the Real Estate Branch again increased considerably, with the emphasis on the Queen's Park Office Extension Program and the Provincial Parks Program.

The Property Section continued the acquisition of land and premises for all governmental Departments, Boards, and Commissions, and for the Department of Lands and Forests extensive Parks and A.R.D.A. programs. Major activities included 48,000 acres for an A.R.D.A. project in the County of Renfew, more than 50 purchases for the expansion of Wasaga Beach Park, the purchase of the former Volkswagen property near Scarborough's Golden Mile for the Department of Education, and an impressive program for A.R.D.A. and Conservation, totalling 173,000 acres in the Districts of Muskoka and Parry Sound.

The Property Directory, which is an index of all Government owned and leased properties, was updated during the year, and copies forwarded to the various Departments.

The Accommodation Section took care of the allocation and utilization of space for all the Government Departments, both government owned and leased. The work involved the planning for and assigning of over 3,000,000 square feet of space and affected 25,000 civil servants. Eighty-five departmental moves were completed. Some activities included planning for Phase II of the Queen's Park Office Extension programs; a detailed study of space utilization in the Whitney Block; and a space utilization survey of the Government's extensive holdings in the Metropolitan Toronto area. In addition, the section controlled the parking facilities, alloting 358 spaces during the year.

The major accomplishments of the year for this section were: the preparation of plans and moving schedules involving 409,430 square feet of space to be occupied by the various Departments of Government in Phase I of the Queen's Park Extension Program; preparation of plans and related data for the utilization of space, 261,258 square feet, for the three Departments who will occupy the Whitney Block; and moving the Department of Health's Laboratory from 360 Christie Street to the new building on Resources Road, Rexdale, approximately 70,000 square feet in size, which necessitated moving more than a million items.

The Land Surveys Section experienced a further increase in work load for the fiscal year, in continuing to provide the legal plans and descriptions necessary for the acquisition and disposal of property for the various departments of the Government, together with topographical plans for use by the Architects' Branch in this Department in the design and construction program. Throughout the year the Land Surveys Section supplied guidance and direction for the Department on all legal survey matters relative to the acquisition or disposal of property.

PROJECTS COMPLETED	
Property Section	643
Accommodation Section.	271
Land Survey Section	201
Total Projects	1,115
EXPENDITURES	
Property Section —	
Purchases	\$ 7,995,439.32
Leases	9,002,965.28
Insurance	34,614.51
Accommodation Section	55,472.47
Land Surveys Section	44,333.98
Total	\$17,132,825.56
REVENUES	
Property Section —	
Sales	\$ 575,979.30
Rent	1,099,142.80
Parking	64,221.00
Total	\$ 1,739,343.10

#### PURCHASING BRANCH

This branch is responsible for purchasing all types of material used in construction trades. Upon receipt of requisitions from the other branches in the department, the Purchasing Branch obtains prices and issues purchase orders to the suppliers.

Other related work includes the preparation of advertisements for tender. The Public Works Department maintains a tender-opening office where all bidders, or any other interested persons, may be present at the opening of bids. Bid amounts are posted on a blackboard as they are opened.

The Institutional Equipment and Furnishings section obtains prices and issues purchase orders for furnishings and special technical equipment to be used in government office buildings, hospitals and schools, etc.

Trucks, machinery and equipment for construction are purchased, stored, and kept in good repair by the Construction Machinery and Equipment section. As equipment is required by the work forces on different projects, it is distributed by them and an inventory kept for head office examination.

Stores and Office Services directs and supervises the movement—in and out—of material in regional and central stores depots and the disposition of surplus equipment and furnishings.

# REPORT OF THE PURCHASING BRANCH

It was a very active year for the Purchasing Branch for the fiscal year ending March 31, 1967. Activities of the Branch are dealt with below, beginning with a summary of purchase commitments during this period:

	Orders Issued	Value	Estimated Federal Sales Tax Saving
General Construction Contracts.	745	\$29,055,163.79	\$1,217,411.38
Advertisements	534	23,279.30	
Construction Materials (Lumber,		,-,-,-,	
hardware, paint, cement, etc.).	2,603	910,573.66	58,272.11
Plumbing and Heating	1,964	456,540.65	40,362.56
Electrical	2,394	744,575.32	70,298.05
Furniture, Furnishings and	,		70,270.03
Equipment	1,289	2,348,737.53	234,628,98
Cleaning Supplies	1,083	120,185.34	8,299.61
Construction Machinery, Equip-	-,	120,100,0	0,277.01
ment and Vehicles	2,462	248,320.22	17,714,77
Special Services — Emergency	-,	- 10,020,22	17,717.77
Purchases, etc	9,545	689,886.83	48,292.07
Queen's Printer	1,231	164,342.11	9,038.81
			7,030.01
	23,850	\$34,761,604.75	\$1,704,318.34

Again, as in the past few years, prices have increased both for material and labour, and this trend is continuing to spiral. Orders issued during the fiscal year ending March 31, 1967, for construction materials remained fairly constant with the previous year.

General construction contracts increased in number during 1966-1967, but decreased in value by approximately \$3,000,000.00. Following is a list of the number and value of contracts issued during the fiscal year ending March 31, 1967:

Job Range	Number	Per Cent	Value
0 — 500	288	38.6	\$ 67,286.06
500 — 750	70	9.4	43,253.11
750 — 1,000	51	6.8	44,295.55
1,000 — 1,500	60	8.1	74,466.32
1,500 — 3,000	78	10.5	165,106.49
3,000 — 5,000	53	7.1	203,519.63
5,000 — 10,000	52	7.0	386,877.34
Over 10,000	93	12.5	28,070,359.29
	745	100.0	\$29,055,163.79

Furniture and furnishings for new buildings constructed by the Department of Public Works showed a decrease in the number of orders issued and also in the value of these orders, over the previous year.

In the Construction, Machinery and Equipment Division, an increase was shown in the amount of money spent for maintenance and purchase of construction equipment. The trucking service provided by this Department was responsible for moving 35 truck loads of furnishing and display materials to the Ontario Government Buildings at the Expo site in Montreal. This Department is also responsible for the Safety Program of the Department of Public Works and during the fiscal year four full time inspectors together with the Director of the Program, made more than 4,000 inspections and travelled more than 100,000 miles. This Division is also responsible for the supervision of truck drivers and our trucks travelled 1,459,274 miles during the year with only three chargeable accidents. Our drivers received 83 Safe Driving Awards.

Under the Surplus Control Officer, the Department disposed of, by advertisement, \$70,531.88 in surplus and obsolete materials.

Steps were also taken to lay down a procedure for decentralized purchasing in our Regional headquarters. Through this decentralization we hope to expedite maintenance and minor construction work. It is expected that this program will be in effect at the beginning of the fiscal year April, 1967.

The Purchasing Office is also actively engaged in obtaining and storing furniture required for the Queen's Park Office Extension Program.

#### SERVICES BRANCH

One of the largest branches in Public Works, the Services Branch is largely concerned with caretaking, security and elevator operation in various government buildings, especially in Toronto. It also acts in an advisory capacity in the caretaking operations at all other government buildings outside the perimeter of the Metro Toronto area.

The Telephone Services, operating from a communications centre in the Whitney Block at Queen's Park, controls and staffs the Centrex Automatic SyItem that permits direct automatic indialing to approximately 8,500 telephones. They also supervise the many private long-distance government lines and prepare the annual edition of the Ontario Government Telephone Directory.

Most of the printing and reproduction work of the department is supplied by the Reproduction and Printing section which also maintains a stock of ordinary office supplies.

The Central Registry and Library files and registers all correspondence under a code system and assembles and distributes books and periodicals for the use of department employees. Microfilming of documents is also carried out.

The grounds and flower beds in the Queen's Park area are maintained by the Horticultural and Landscaping section. The chief horticulturalist also acts as a consultant to the architectural-engineering planners when required.

Concern for fire safety in government buildings and the need for properly planned fire evacuation procedures is also the responsibility of this branch. Two Fire Safety inspectors carry out inspections and recommend safety measures for buildings owned and leased by the department.

## REPORT OF THE SERVICES BRANCH

The primary responsibility of the Services Branch is to provide services to the many government-owned buildings located in the Metropolitan Toronto area. To carry out the many programs of this Branch, a staff complement of 818 was required and the services provided fall into six categories, each of which is described briefly as follows:

#### **JANITORIAL**

Janitorial functions include all the housekeeping and cleaning operations required to care for 25 government-owned buildings containing in excess of three million square feet of usable space. Services provided include house-keeping, custodial, policing of government controlled parking lots as well as the relamping of fixtures.

Tenders were called in March, 1966, covering janitorial services for a 12-month period for the Leslie M. Frost Building (South Wing). The following tenders were received and opened in public:

ALLIED BUILDING SERVICES, LTD., TORONTO	\$43,792.00
Gordon A. MacEachern Ltd., Toronto	
Scot Young Ltd., Toronto	
Anglo Canadian Building Maintenance, Toronto	
Dustbane Enterprises Ltd., Toronto	\$64,080.00
Fred Hamilton Maintenance Ltd., Toronto	

#### FIRE SAFETY

Fire evacuation programs were implemented in various government buildings during the year. In addition, fire safety inspection of buildings was carried out with recommendations made for the installation of systems and equipment wherever it was found necessary to do so.

#### REPRODUCTION AND PRINTING

During the year this division provided almost complete reproduction service to the department as well as to other departments whose workloads are too small to support their own units. The material produced for other departments was done on a cost-recoverable basis.

#### CENTRAL REGISTRY

There are four programs for which this division is responsible, namely: Central Files, Microfilming, Mail and Messenger Service, and the Departmental Library.

The Central File section receives, codes, and files approximately 400 pieces per day and there are presently 20,000 active departmental files on deposit for which this section is custodian.

The Microfilming section processed on film approximately 500 cubic feet of departmental records during the year. The documents that were filmed have been disposed of and prime office space that was used to house these documents has been put to more efficient use.

The Mail and Messenger section provides pickup and delivery service to and from various branches of the department and the Central Post Office. The table following contains comparative workload data for the past year:

Incoming Mail — 700 pieces daily Outgoing Mail — 550 pieces daily Inter-Office Mail — 1,400 pieces daily

A departmental reference library was established in the summer of 1966. Books and technical papers on Government Administration, Politics, Economics, Management, Hydrology, Building and Engineering have been made available to the staff of the department. Books and technical papers were made available during the year to several branches of the department on an inter-library loan basis from libraries in Canada and the U.S.A. The library has also collected information on special events in Canada; also a general interest file on various subjects such as International Development. Transportation, Industry and Export Selling power.

#### LANDSCAPING AND GROUNDS

In the past year this division carried out the many programs for which it is responsible such as the maintenance and care of all planted areas around the government buildings in the Queen's Park area and the planted areas surrounding other government-owned buildings in the Metropolitan Toronto area. Included in the services provided are lawn cutting, tree trimming, shrub pruning, fertilizing, planting of flower beds, replacement of trees and shrubs, cleaning and removal of snow from sidewalks adjacent to government-owned buildings as well as the government controlled parking areas.

#### **COMMUNICATIONS**

This section is responsible for leasing and procuring suitable telephone, inter-com, and signal services for all provincial departments, commissions,

boards, and foundations as well as arranging for the leasing of long distance facilities for voice, teletype, and data transmission. The internal communication systems provided are purchased on a tender basis unless it is proven to be more economical to lease the system.

The demand by departments for additional telecommunication services in the past year caused the size of the "Centrex" telephone system to grow by 910 telephone sets and 270 locals. To effect greater savings in long-distance telephone costs, 11 new localities were added to the inter-city network. At the end of the year, the "Centrex" system serving government offices in the downtown Toronto and Downsview areas comprised 8,500 telephone sets, 4,850 working locals, 13 main switchboard positions, 61 inter-city lines serving 157 localities, 268 direct-in-dialing trunks, 375 ninth level outgoing trunks, and 40 in-coming Empire exchange trunks.

One of our major projects is the provision of telecommunication and associated services for the Department of Social and Family Services, and the Department of Health, both of which shall occupy the Hepburn Block, Queen's Park Office Extension Program.

To provide these two Departments with adequate telephone, inter-com, and signal services, it is estimated that the Hepburn Block will require approximately 700 telephone sets, push-buttons and buzzers, 150,000 feet of cable and wire, 50,000 cross connections, and 6,000 man hours.

This section is also responsible for the publication and distribution of the annual Ontario Government telephone directory, of which 15,864 copies were printed this year.

To carry out the many programs of the Services Branch described briefly in this report disbursements totalled \$5,732,500.00 for the fiscal year ending March 31, 1967.

#### LEGAL BRANCH

This branch is concerned with all legal matters affecting the purchase, sale, or leasing of property, including expropriation and the granting of easements and licenses of occupation for departmental lands. The legal branch drafts necessary agreements for the Crown, and is the custodian of deeds, leases and other agreements affecting the department. It also supplies necessary legal advice to department executives including construction contracts and claims arising from these.

### REPORT OF THE LEGAL BRANCH

It has been another very active year for all employees in the Legal Branch. The work-load was again substantially higher than the previous year, especially in regard to the acquisition and leasing of real property.

An analysis of our leasing practices during the past year reflects changes and trends in our economy. There were a significant number of leases in urban areas for longer terms, with some containing provisions for taxescalation and maintenance-escalation. The growth in our leasing activity and indeed in our land acquisition program, however, was not entirely confined to urban areas and seemed to have been fairly evenly spread throughout the province.

The Department, during the year, also experienced a steady growth in its construction program. The insurance and claims work carried out by the Branch was accordingly maintained at a high level.

We were happy to continue co-operation with our safety officers in their efforts to ensure better safety practices on our construction sites and in our buildings.

Many miscellaneous agreements were prepared during the year, pertaining to municipal and other services for our buildings, well drilling, cafeteria services and other matters. Of these agreements, it is worthwhile to note our participation, with our associate architects, in the preparation of various contracts for art to be placed in the Queen's Park development.

### PERSONNEL BRANCH

Personnel administers the selection and engagement of personnel in conjunction with the various Branches and provides guidance on staff placement, performance, training and organization. It also acts in liaison with the Civil Service Commission for staff classification and job analysis, and in the interpretation of the Public Service Act and regulations.

# REPORT OF THE PERSONNEL BRANCH

This is a relatively small but extremely active branch that carries out the multi-role function of an efficient public service personnel operation. No program can be carried out without people and the efficient utilization of staff. The development of their skills is always the prime motivation behind the personnel operation.

Good personnel practices are needed to attract good employees, and to hold them once they have been obtained. Good morale and high production are often related. Good management practices and loyalty to the organization often go together. Sound job evaluation and fair pay help employees to have pride in their organization.

In all these areas the personnel officers advise all levels of management. They also carry out their delegated responsibility to the Deputy Minister, the elected official, and the people of the province, applying the Public Service Act and Regulations to ensure that a uniformly high level of personnel management is maintained.

Additional responsibilities of the branch include the maintenance of all personnel records and the processing of all transactions that involve people, salaries and positions.

#### RECRUITMENT

A total of 124 promotional positions were advertised. Seventy-two vacancies were filled internally and 40 were staffed by applicants from outside the department.

During the latter part of the year, we started our own temporary office help service in the organization, thereby saving considerable money for the government. A good deal of time was devoted to formalizing the handling and processing of large numbers of employees in the Unclassified Staff and developing new contract procedures.

#### TRAINING AND DEVELOPMENT

Due to the widespread staff shortage the Department instituted an extensive staff retraining program in the administrative, technical and clerical fields with good results. Twelve of our employees have received a 50 per cent return of tuition fees for courses attended which were pertinent to the performance of their duties. Eleven employees attended courses for which the department bore the full cost. Of these, 10 participated in Certificate Public Administration Courses conducted by the Ryerson Polytechnical Institute and the University of Toronto. Two employees attended Supervisory and Management Training Courses. Thirty-four candidates participated in the In-Service Training Courses conducted by the Department of Civil Service.

#### ORGANIZATION AND CLASSIFICATION

Re-organization continued throughout most of the branches resulting in the preparation of 154 new position specifications and the revision of 114. Sixty-two audits were carried out to insure appropriate classification and the need for these positions. One new class series was prepared and submitted to the Department of Civil Service.

The reduction in output over last year's figures is due, for the most part, to this section operating 50 per cent under strength. This is attributed to one of the Personnel Officers transferring to the Recruitment Section as Recruitment Officer, and the Supervisor of the section being temporarily assigned to systems and procedures work for Organization and Methods Branch of the Treasury Board.

#### ADMINISTRATION SECTION

Salary increases for 2,130 employees were processed through merit increases, salary range revisions, and 143 promotions.

Probationary Staff appointments totalled 212. Of these 23 were transfers from the Unclassified Service. Regular Staff appointments totalled 165.

#### ATTENDANCE RECORDS SECTION

Attendance records and accrual of vacation and attendance credits continue to be maintained. However, supervision over the signing of daily attendance registers has been transferred to the care of supervisors within each branch, with daily attendance registers being forwarded to this branch for posting to the ledgers, and the preparation of reports.

Separations from the service totalled 259, detailed as follows: Regular Staff 80, Probationary 81, Unclassified Staff 98. The reasons for these separations are shown below:

Retirement 30
Ill Health27
Death
Resignations165
Terminations
Positions abandoned
Transfers to other departments 8
Total

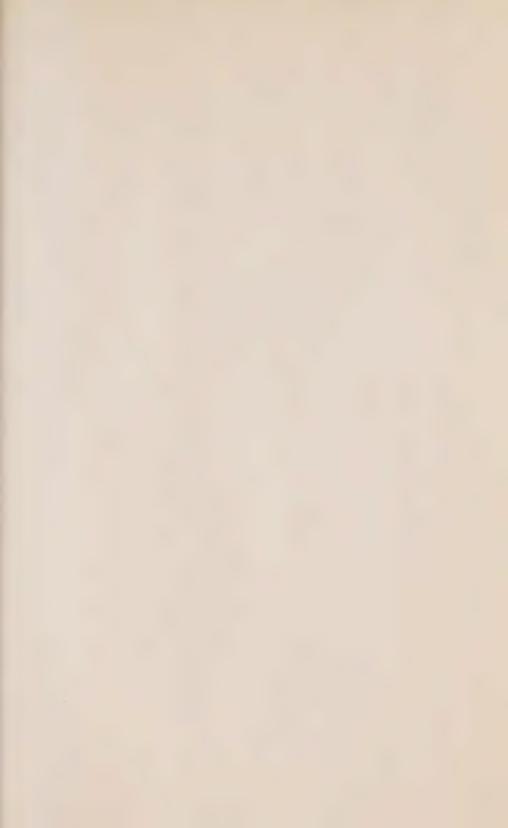
Leaves of absence with pay, including Workmen's Compensation cases, totalled 265, and Leaves of absence without pay 115.

#### **GRIEVANCES**

There were four grievances and in all cases the departmental action was upheld by the Public Service Grievance Board.

#### NOTES

#### NOTES









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